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Substance Abuse in Our World: Then, Now and Future

We live in a connected world. What happens in Asia, Africa and Australia impacts North America, Europe and South America. The influence of globalization could not be more evident than in the world of substance abuse. A constantly changing, tumultuous and dangerous problem, the global spread of drug abuse presents tremendous social, political and economic challenges to the world as a whole and to each affected region. In this edition of the Journal, our subject matter experts explore substance abuse in different parts of the world and how the associated problems become global problems.

Included in this edition is an article about the growing problem of illicit drugs in Africa, where the gathering of accurate, reliable information about drug abuse and trafficking is

historically challenging. The author makes the point that although few would argue that there is a need for programs that address this critical issue, given the situation of instability and other difficulties in many regions of Africa, effective strategies for combating this problem and providing drug abuse education are extremely tricky.

We also offer a piece on drug testing in South America, specifically as it relates to the potential “crack plus” epidemic in that region. As the author describes, “crack plus” is a growing problem in this area of the world and drug testing is challenging at best in most areas of South America. The trend of “crack plus” (crack cocaine with other additives) adds a new level of difficulty to the drug testing situation in this region.

This issue also contains a commentary on drug decriminalization and legalization. This Australian author offers his perspective that the key component of decriminalization is permissibility, and that consumption increases as a result. He uses intriguing examples and research to support this theory.

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Drugs in Africa 2013

Ian Oliver

Africa was once described as the Dark Continent mainly because little was known about the interior of a land mass that currently accommodates one-fifth of the World's population and includes a quarter of the World's countries. The gathering of accurate information remains an always difficult and sometimes impossible task and particularly so in the case of the use and trafficking of illicit drugs. Since 2005, UNODC (United Nations Office on Drugs and Crime) in cooperation with UNAFRI (African Institute for the Prevention of Crime and Treatment of Offenders) has been attempting to improve on the sparse information by an initiative *Data for Africa* with the overall objective to enhance the knowledge of drugs and crime in that continent. The aim of this programme is to raise the capacity of African countries to collect and analyse data and specifically to assist member states to generate more accurate information and to share that knowledge both regionally and internationally with the intention that cooperative action may be taken to combat the associated problems.

Currently Africa is the least well documented region in terms of data and information on drugs and organised crime although there are regular news and anecdotal reports about the growth of drug trafficking through Africa and the consequent increase in the use and abuse of drugs in large parts of the continent. It remains true that many African Governments have been unable to supply accurate information about the situation in their own countries including information requested under international drug and crime control treaties. Where figures are provided, often owing to the limited resources and abilities of some national authorities, they do not represent or reflect the true extent of any problem. UNODC reported, for example, that in 2004 only 24 out of the then 53 countries (45%) responded to the annual reports questionnaire despite this being a mandatory requirement under the drug control treaties. This situation has not much improved today and so analysts truly are working in the dark. The absence of reliable information results in constrained ability to address any problems and this, in turn, has a damaging impact on the development of successful strategies to inhibit and reverse the problems that are developing¹

A further challenge is that where knowledge is imperfect, some prefer to deny that any problem exists, because it relieves them from the obligation of doing anything. If there is no acknowledged problem, then there is no need to address it by training people and diverting staff to tackle it, by spending from limited budgets to eradicate it, and no blame is attached to anyone for allowing it to develop. There is also the issue of corruption and where drug trafficking is known to exist; some of those who should be minimising the harmful social

¹ Crime and Development in Africa, UNODC, 2005

consequences are frequently indulging in or conniving at organised crime and profiting from it.

Illicit drugs have a huge impact on economic and social development and are associated with international organised crime and money laundering on a vast scale. They create instability, insecurity and the spread of blood-borne diseases such as AIDS/HIV and Hepatitis and in Africa, where these are prevalent; this is a dangerous and undesirable consequence. Some 10-13 per cent of drug users continue to be problem users with drug dependence and/or drug-use disorders. The prevalence of HIV (estimated at approximately 20 per cent), hepatitis C (46.7 per cent) and hepatitis B (14.6 per cent) among injecting drug users continues to add to the global burden of disease. While the use of contaminated needles and syringes has long been the major cause of HIV infections among drug users, several studies have also indicated that the administration of cocaine, “crack” cocaine and Amphetamine-type stimulants (ATS) by means other than injection is associated with an increased risk of HIV infections as a result of unprotected sex, which is very common in Africa.²

World Drug Report 2012

Despite the inadequate data on illicit drug use in Africa, it is known that the most commonly used drug is cannabis, especially in West, Central Africa and Southern Africa although its presence appears to be universal throughout the continent and its use assessed to be higher than the global average. It is estimated that ATS and opioids are prevalent in all sub-regions comparable with the global average; opioids contribute considerably to demand for treatment in Africa. Reported increases in the trafficking of cocaine indicate greater use, particularly in West and Central Africa and Southern Africa. In a survey of school children in Sierra Leone and Liberia, cocaine use appeared to be higher than heroin³ although the use of other substances was noted, including benzodiazepines and inhalants. There is also a reported escalating use of heroin and drug injecting that is emerging as a dangerous trend especially in North and Eastern Africa. In sub-Saharan Africa there are signs that as many as 2 million may be injecting drug users with the associated risk of the spread of blood-borne diseases. The coastal markets of Africa are reporting more heroin seizures.⁴ Overall there are indications of a growing trend in the use of all drugs in many areas of the continent.

Regional reports:

West Africa: At one of the regular meetings of the Heads of National Law Enforcement Agencies (HONLEA)⁵ in Accra, Ghana, in June 2012, grave concern was registered about the threat posed by the growing and multi-faceted drug problem

² World Drug Report 2012 – Executive Summary

³ Ibid “Data on seizures and heroin use suggest that heroin markets are expanding in some parts of Africa. An increase in heroin seizures has been reported, for example, in the coastal areas of East Africa, West and Central Africa, and North Africa, suggesting that Afghan heroin is being diverted to those areas. In 2010, heroin seizures increased most notably in Egypt (from 159 kg in 2009 to 234 kg), in Kenya (from 8.5 to 35 kg in 2010), in Nigeria (from 104 to 202 kg) and in the United Republic of Tanzania (from 7.9 to 191 kg). Mirroring the increase in seizures, there are reports of the emerging use of heroin and injecting drug use, particularly in Kenya, Mauritius, Seychelles and the United Republic of Tanzania.”

⁴ Ibid.

⁵ Report of the Twenty-second Meeting of Heads of National Drug Law Enforcement Agencies, Africa, held in Accra from 25 to 29 June 2012

occurring throughout Africa and especially in the West African Region. It was also acknowledged that countering this threat was inhibited by a lack of sufficient resources and equipment to address the magnitude of the problem. Representatives reported on the difficulties encountered by law enforcement agencies, which included the fact that the region had experienced a shift from being mainly affected by the transit of drugs to also experiencing the consumption of the drugs, resulting in an increase in the misuse of drugs. Reference was also made to the lack of analytical and in-depth studies on drugs and their impact in the region. Cannabis was identified as the most widely cultivated, trafficked and abused drug, often protected by armed militias who intimidated local police in an attempt to prevent their intervention against cannabis farms. Inevitably a lack of adequate equipment, training and cooperation was mentioned as a major regional problem. Policy makers need factual, objective and comparable information concerning illicit drugs, their use, numbers of people requiring treatment and correct information upon which to base and develop effective drug control strategies.

The Group acknowledged that this region has many challenges in addressing drug control including heroin trafficking from South East Asia and transatlantic cocaine trafficking from Latin America, which is causing instability, especially in Guinea Bissau. Additionally, the manufacture of ATS is an increasing problem combined with the false description of pre-cursor chemicals imported by chemical companies granted permits and the dangers and difficulties in dealing with clandestine laboratories. There is also an issue with fraudulent medicines: it is estimated that at least 10% of the medicines circulating in the region are fake.⁶

Nigeria: the availability of dangerous drugs in Nigeria is reported to be widespread with organised crime playing a major role; Nigeria has long had a negative reputation as being a major drug trafficking country. For 5 years up to December 2011 PADDI – (People Against Drug Dependence & Ignorance, Nigeria) has organised a Conference in London with senior Nigerian Government representatives in attendance seeking to learn new counter narcotics and drug awareness techniques; they have consistently asked for assistance in reframing anti-drug legislation for Nigeria; unfortunately the religious war between the north and south has halted any progress in the endeavour.

Eastern Africa: this area covers 13 countries which differ significantly in terms of population and cultural and ethnic patterns; it includes countries with the lowest economic indicators and standards of living, with as many as 180 million people surviving under extreme poverty. The region is much affected by HIV and AIDS.

There is significant trafficking of heroin, cocaine and ATS into and through Eastern Africa and there is a reported emergence of trafficking in precursor chemicals. The international air and seaports are key entry points mainly for drugs from Asia and the Middle East. Eastern Africa and Africa as a whole have a growing market for illicit drugs and this combined with inadequate trafficking controls make the region a convenient transit point for distribution to the whole continent. There are the inevitable complications of inadequate training and equipping of enforcement agencies combined with widespread corruption.

⁶ UNODC Transnational Organised Crime in West Africa – February 2013.

Southern Africa:⁷

South Africa dominates drug use in the SADEC (Southern African Development Community) region, in both numbers of drug users and variety of drugs consumed. There have been no reliable national drug use surveys.

South Africa's Eastern Cape and Kwa Zulu Natal Provinces produce cannabis in abundance and much of it is exported to the rest of Africa. Recently the country has been identified as a major cocaine transit route and some of the drug either remains in the country for local consumption or leaches into surrounding areas. Cannabis is the main drug causing treatment demand in Africa.⁸ Methamphetamine was imported from Europe but now much of it is locally produced. Heroin use has spread into all ethnic groups with the associated risk of the spread of blood borne diseases. While there have been few major seizures of heroin reported from Mozambique, it is widely believed to play an increasing role in trafficking of heroin from Afghanistan (via Pakistan and the Persian Gulf) and cocaine from South America, into the Republic of South Africa (RSA) and via southern Africa to markets in Europe. Heroin is typically shipped from Pakistan and the Persian Gulf in either dhows or cargo containers to East Africa, then overland to Mozambique, or directly to small harbours in northern Mozambique. Heroin is then moved overland to RSA for local consumption or shipment to Europe. ATS are also gaining in popularity and increasingly being manufactured in country for local consumption.⁹

Zimbabwe - a specific case:

As a regular visitor to Zimbabwe over a period of twenty years it is apparent that illicit drugs are widely and freely available throughout the country. When this was first brought to the attention of the Ministry for Education and other officials, denial was the immediate response, but it has become accepted that a major problem is developing with most illicit drugs. This has been confirmed by personal observation and by interviews with school pupils, head teachers and some parents. It is also true that many officials do not know how to respond effectively but are anxious for assistance in raising drug awareness not only in the schools but nationwide; inevitably there is also the position that no funding is available to develop the necessary demand reduction education programmes.

There are regular reports in the national and local newspapers that police have made significant drug arrests. Zimbabwe Republic Police (ZRP) does have a department that sends officers into schools to give basic drug awareness training but this is not thought to be adequate by those school heads with whom the matter was discussed. Contact has been established between the UNODC Regional Office in Pretoria, South Africa, and the Minister for Education but as yet no specific programmes have been established. UNODC depends upon international sponsors for the necessary funds to conduct programmes in specific regions; therefore it is imperative that potential donor countries be made aware of the growing problem in Zimbabwe and the African continent.

⁷ UNODC Regional Office Pretoria – report.

⁸ World Drug Report 2012.

⁹ UNODC Regional Office, Pretoria, RSA. See also <http://www.sahealthinfo.org/admodule/sacendu.htm>

Whilst all of the major drugs of abuse are known to be available in Zimbabwe, some head teachers have expressed specific concern that some of their pupil athletes are using performance enhancing drugs and steroids (this was noticed particularly around the time of the 2012 Olympic Games). Clearly an all embracing and well informed education programme is necessary to counter these dangerous developments. Discussions with the Bulawayo City Council Junior Council (comprising senior pupils from numerous schools in the City) in May 2012 resulted in a Drug Awareness Initiative. This program included a march through the City with the cooperation of the Zimbabwe Republic Police and the preparation and distribution of posters and tee-shirts, and signing of a pledge against the use of illicit drugs; a commendable project but limited by a lack of funding. In March 2013, discussions with the Provincial Director of Education in Bulawayo resulted in an acknowledgement of a serious problem and a plea for assistance in promoting drug awareness.

Public Health is a particular issue in Zimbabwe, which has a high incidence of AIDS/HIV. Medicines and anti-retroviral drugs are not widely available or affordable for the majority; therefore it is particularly important that accurate information is published in the hope of minimising the spread of these blood-borne diseases caused by the use and sharing of syringes. The international organised crime and money laundering associated with drug trafficking are also huge threats to an already vulnerable and unstable economy.

At a meeting with the Permanent Secretary of the Ministry of Education and the Heads of relevant Departments in March 2013, it was conceded that a national drug awareness programme is immediately necessary and a request for assistance was made; however, it was also stressed that no budgetary provision has been made or is likely to be available to develop urgently needed training. It was also emphasized that there is no system in place for gathering and analysing accurate data. This is a picture that is duplicated in many African countries.

The problems of dealing with illicit drugs in a vast continent

Even the best and most efficient law enforcement agencies cannot hope to interdict more than 20% of trafficked drugs that come within their area of influence and in many cases the figure is more likely to be 5% or less. Thus, whilst law enforcement is a vital part of any drug control strategy, it would be unwise to place too much reliance on this alone. Of fundamental importance is the need for well informed and accurate demand reduction education programmes so that a balance between supply and demand reduction may be achieved. Adequate and effective treatment for those who are afflicted by drug use and dependency is also essential. Intelligence-led policing and international cooperation is vital if success is to be achieved, but in a continent as vast as Africa, now with 55 (or more) countries, this is a difficult and almost impossible task. There are varying standards of professional competence, beset by restricted budgets and scarce resources as well as widespread corruption and self-interest. Similar problems exist within the field of education, where the most effective demand reduction programmes should be operated. In Africa, many people are denied access to education because of unaffordable fees and levies. Standards vary enormously even in the most efficient countries, but vast numbers of people in the African continent are denied the opportunity of any formal education and many are limited to primary schooling.

It is pertinent to note that recommendations for Government action usually follow from meetings between various officials who are concerned about the developing drug problems. An example of these is from the HONLEA¹⁰ meeting in Accra already mentioned: ~

- a) As a part of their national strategy to combat drug trafficking and cross-border crime, Governments should be encouraged to actively support the Airport Communications Project of UNODC and establish joint airport interdiction task forces at their international airports;*
- b) Governments should review the training, equipment and preparedness of their law enforcement authorities to be able to respond to the threat posed by amphetamine type stimulants and their illicit manufacture;*
- c) Governments should commit their chemical control authorities to registering with, supporting and actively participating in the Pre-Export Notification Online system offered by the International Narcotics Control Board so as to be able to confirm the legitimacy of commercial parties and their transactions of pre-cursor chemicals;*
- d) States participating in meetings of heads of national drug law enforcement agencies, Africa, should review relevant domestic legislation with a view to aligning it with international drug conventions and in order to strengthen harmonization at the sub-regional and regional levels;*
- e) States participating in meetings of heads of national drug law enforcement agencies, Africa, should commit themselves to increasing resources for public education for demand reduction, including the use of resources resulting from seizures.*

Whilst few would quarrel with the sense and necessity of implementing such recommendations, the likelihood of all governments across the continent being able to do so is remote and it will likely be many years before these proposals are implemented; while the trafficking and use of illicit drugs will continue largely uncontrolled. In a continent riven by wars, famine, corrupt dictatorships, social disorder and instability, the prospects for a universal and effective counter-narcotics strategy are limited¹¹.

About The Author:

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¹⁰ See footnote 2.

¹¹ The population aged 15-59 is forecast to grow by 2.1 per cent per year in Africa over the period 2011-2050, which is far more than in any other region; there is a risk of increasing drug use there. World Drug Report 2012 page 94

Conflict of Interest Statement:

I declare that I have no proprietary, financial, professional or other personal interest of any nature or kind in any product, service and/or company that could be construed as influencing the position presented in, or the review of, the manuscript entitled Drugs in Africa 2013.

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Drug Testing in South America and the Potential New Crack Epidemic- “Crack Plus”

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Abstract

Drug testing is common in the United States, but remains new to South American countries. Many businesses and companies in South America are beginning to understand the benefits of drug testing to promote a safe and productive workplace. However, there are cultural and legal considerations that need to be overcome before drug testing can become common in the South American workplace. A new form of crack cocaine containing pharmaceuticals or other additives, referred to in this report as “crack plus”, is now being produced in South America, and is becoming more frequently detected in the United States and Europe. The challenges for drug testing associated with the new crack plus potential epidemic will require newer and more expanded drug testing methods to detect these additives. Chile, Argentina, and Columbia workplace drug testing will be highlighted in this report.

Key Words

Drug testing, South America, Chile, Argentina, Colombia, workplace, crack, additives, Levamisole, Phenacetin, crack plus

Introduction

South America includes 12 independent countries: Argentina, Bolivia, Brazil, Chile, Colombia, Ecuador, Guyana, Paraguay, Peru, Suriname, Uruguay, and Venezuela. Its population is estimated at more than 385 million. The native languages are Spanish and Portuguese (Brazil). There are approximately 192 million Portuguese-speaking and 193 million Spanish-speaking people. The continent of South America has an

area of 6.8 million square miles, ranking fourth in size after Asia, Africa, and North America. It also ranks fifth in population size after Asia, Africa, Europe, and North America.

It is projected that by 2015, many South American countries may have a similar per capita income, from new job creation, compared to the developed countries. These new jobs will create the opportunity for more drugs to enter the workplace. As a result of increased drug related accidents, thefts, and costs, as well as lower job performance, employers will be encouraged to develop drug-testing programs. Currently in South American countries, there are only a limited amount of drug-testing programs currently available. Hair and oral fluid drug testing is still unavailable to the majority of South American countries. Even if a company program requires the collection of hair or oral fluid for drug testing, the samples will most likely have to be sent internationally for analysis. The standard drug tests developed over the past 25 years in the United States need to meet the challenges of the newly emerging forms of crack cocaine, which include dangerous additives such as pharmaceuticals.

[South American Cocaine and the Potential New Crack Epidemic](#)

South America has the unfortunate distinction of being the world's largest producer of cocaine. A new and disturbing form of crack cocaine is emerging from this region and is spreading globally. Crack cocaine is a solid form of powder cocaine that is smoked. Powder cocaine is produced from the coca bush, which is widely grown in South America.

In 2010, the total area under illicit coca bush cultivation in South America was 154,200 hectares. This is 6% less hectares than in 2009. A hectare is a metric unit of measure equal to 2.5 acres. The major producers are Bolivia, Peru and Columbia. The cultivation of the coca plant in Bolivia is 31,000 hectares, representing 20% of the illicit cultivation of the plant in South America (1). In Peru, the illicit cultivation increased by 5.2% in 2011 to reach 61,200 hectares. The illicit cultivation in Colombia decreased from 2009 by 15%. It still has 62,000 hectors under cultivation, and it is projected that the decrease will continue. As such, Bolivia and Peru are now emerging as significant producers of the coca plant in South America as well as centers of the new crack cocaine potential epidemic.

North American countries, primarily the United States, followed by European and then South American countries, are the biggest markets for illicit cocaine. Cocaine produced in Colombia is sent mostly to these foreign markets. The cocaine from Bolivia and Peru is sent to those foreign markets as well, but is primarily used in the countries of the Southern Cone: Argentina, Chile, Paraguay, and Uruguay. Recently, Brazil has also been shown to be an increasingly major consumer of Bolivian and Peruvian cocaine and Oxy. This has been observed in Brazilian cities, such as Acre, that are located near the borders of Bolivia

and Peru. The illicit market for cocaine in the United States has declined significantly in recent years. However, in 2009, with an estimated annual use between 150 and 160 tons, the United States remained the largest illicit market globally. The U.S. authorities estimate that 90% of the cocaine used in North America comes from Colombia. The amount of cocaine used in Europe has doubled in the past decade. Recent data has shown evidence that cocaine use is stabilizing at higher levels, around 120 tons (2).

Most North American and European cocaine comes in the powder or hydrochloride form, which is inhaled or injected. In South America, cocaine is used in the form of crack that is smoked, and is sometimes mixed with marijuana or tobacco. It is here that the new crack epidemic, which is different from previous epidemics experienced in the United States and Europe in the 1980s, has its origin. It is not new for South American crack to have additives and impurities. It has been used in that form for many years. What is new is the variety and extent of the additives purposely added to the crack to have it produce a more unique effect in order to differentiate it in the market from traditional crack. There is no shortage on the amount of illicit cocaine bush propagation, powder cocaine, or crack cocaine manufacturing. As such, the cartels are now adding wide varieties of pharmaceuticals and other agents that are unique and more marketable. This is the new “Crack Plus” referred to in this report.

Crack plus is manufactured in jungle labs or homes and is referred to as Merca, Oxy, Bazuko, Pasta Base, or Falopa, to name a few. This form of crack is now spreading across South America and into North America and Europe (3). The new crack plus is marketed to produce unique effects or highs, distinct from traditional crack, to attract new clients. Unfortunately, these unique effects are toxic and potentially lethal.

Cocaine is primarily manufactured in jungle-based camps using very crude methods. One manufacturing camp has a different method than others. Their process is not controlled, is highly variable, and is very unsanitary. This produces the cocaine powder which then is converted into the solid form, rock or crack cocaine.

In the production of the new type of crack, there is a significantly reduced refining process which allows impurities, including dangerous chemicals, to remain in the final product. This makes the new crack cheaper to produce. The reduced cost of production allows for a lower price, making it much more accessible to the poor as well as to street children.

As previously stated, the initial manufacturing process to produce powder cocaine often leaves trace and sometimes significant amounts of by-products that are harmful and could cause serious illness. Here is a list of some of the by-products of cocaine and crack manufacturing that can be present in the final product:

- kerosene
- gasoline
- battery acid
- calcium oxide
- sodium bicarbonate
- acetone
- organic solvents

All of these are used in different stages of production of cocaine powder and will ultimately end up in the crack produced.

What is more concerning is the new wave of intentional additives, which some cocaine manufacturers add in the jungle labs to make these products “unique”. The new term used in this report for the new form of crack is “Crack Plus”. Crack plus is crack with a wide variety of pharmaceutical and other additives to produce a unique high. This has created a new crack public health emergency in the streets of South America that is now spreading worldwide.

Here is a list of some, but not all, of the additives now found in South American cocaine powder and the new crack:

- Levamisole: veterinary medication expels gastrointestinal worms in cattle
- Phenacetin: banned cancer causing pain reliever
- Procaine, Benzocaine and Lidocaine: local anesthetics
- Femproporex : stimulant like amphetamine
- Fluoxetine: and other antidepressants

- Diltiazem: heart rate regulating medication
- Paracetamol, Dipirona: pain relievers
- Hydroxyzine: antihistamine

“Crack Plus Levamisole” produces a different effect to the user or “high” than traditional crack. Unfortunately this additive is dangerous and has been associated with crack addict deaths. The most startling recent report is that 50% of crack addict autopsies reveal the presence of Levamisole (3). Levamisole is a cattle deworming veterinary medicine that decreases the body’s immune system in humans. This allows for a number of serious opportunistic infections, especially in HIV positive crack users that already have compromised immune systems (7).

“Crack plus Phenacetin” produces yet another very different effect or “high” to the user than “Crack Plus Levamisole” or traditional crack and is marketed as such. Phenacetin is a banned, off the market pain relieving medication that is known to cause kidney damage and cancer. There is still tons of Phenacetin available, some of which is now starting to be used as an additive in crack.

There are literally dozens of new crack plus forms of drugs now on the streets of South America and spreading worldwide. Now that we know that several new crack plus forms exist and the dangers associate with them, plans need to be made to address this new “Potential Crack Plus Epidemic”.

The first plan should be education and prevention campaigns that are simple and targeted, as the most vulnerable group includes children and young adults. Follow-up medical testing of crack addicts, to insure their immune system has not been compromised or exposed to excessive amounts of cancer causing and other compounds, is also needed. Not all of these by-products and additives are easily detected in urine or other biological samples. Some research in this area is currently underway, but a great deal more is needed. One current research approach is to screen for Levamisole and Phenacetin in urine samples of known crack users. This could be an early warning system to alert treatment staff that the patients may need follow-up testing to check kidney function, cancer markers, and immune function.

Another concern is that this new form of crack plus is inexpensive, perhaps only a few dollars for small rock. All the by-products and additives make it very dangerous and potentially deadly. This is especially true for child addicts, whose bodies are smaller and still developing, or addicts in poor health.

In addition to these new crack plus and cocaine public health concerns, there still remains the problem of inhalants like gas, toluene, paint, glue, and other solvents on the streets of South America. This is a very serious problem for South America as there is a large population of street children addicts who work for drug dealers in the illicit drug trade. In addition to being paid in crack plus, these children are also paid in inhaling solvents. This is a serious public health and safety issue for South America's most valuable and vulnerable resource, its children.

Prevalence of Drugs and Alcohol

It is very difficult to find accurate alcohol and drug prevalence numbers. This is not a problem unique to South America. It is a problem worldwide. Most prevalence rates are based on interviews with citizens who may or may not provide accurate answers. Here are official reports of three South American countries:



Chile: According to the World Drug Report, UNODC 2011, the prevalence of alcohol was 57.5%, Cocaine 2.4%, Marijuana 6.7%, Amphetamines 0.4 % and Ecstasy 0.1%



Argentina: According to the World Drug Report, UNODC 2011, the prevalence of alcohol was 61.4%, Cocaine 2.6%, Marijuana 7.2%, Amphetamines 0.6% and Ecstasy 0.5%.



Colombia: According to the World Drug Report, UNODC 2011, the prevalence of alcohol is 50.2%, Cocaine 0.8%, Marijuana 2.3%, Amphetamines 0.5% and Ecstasy 0.3%.

It is interesting to note that the prevalence of alcohol and drugs in both Chile and Argentina are similar.

The alcohol and drug prevalence numbers appear low because they are estimated based on surveys (5) which may have incomplete or inaccurate information. The important thing to note is that they reflect a trend that is very similar to Colombia figures.

Unfortunately, these figures may not accurately reflect the reality of South America drug and alcohol consumption. In the case of Colombia, a recent study at the schools in 2011 shows a consumer alcohol prevalence of 56.7%, a marijuana prevalence of 5.2%, and a cocaine prevalence of 1.8% percent.

These figures are higher, double for marijuana and cocaine, and are more in line with the reality of drug and alcohol abuse in this country. These figures also point out the inconsistencies between various studies and research in the same population (6).

Facts about Drug Testing

Perhaps the most important fact about the rules for drug testing in South American countries is that there are no rules.



The term "no rules" mean that there are no laws prohibiting or mandating drug testing in the South American countries. It is important to point out there are no standards for drug testing as there are in the United States.

In some South American countries there are certain laws that prohibit drug use in certain dangerous occupations, such as mining.

These commonly are in contradiction with other laws in the constitution of that country, which often implies that these prohibitions are without penalty.

Here are some examples:

Chile:

- In general, there are no rules or regulations on testing protocols for private companies.
- 5% of private companies use a pre-employment and occupational testing for alcohol and drugs (A&D), 10% offer a prevention A&D course, and 85% do nothing.
- There are at least three important laws related and in conflict.
 - Labor Code: Forbids working under the influence of alcohol, but does not address drugs.
 - Mining Code: Forbids drug and alcohol use in mining operations and allowing police force if necessary to remove employees under the influence of alcohol and drugs.

- Presidential Decree (P.D.) 1215: Establishes a testing protocol for public employees similar to the United States Federal Drug Testing Mandated law but involves only some positions and not the decision makers like Ministers.
- Courts: Trials for drug use in a workplace are just beginning. Chile currently has only 1 or 2 cases a year.

For more information on this please go to: www.senda.cl and www.globalpartners.cl

Argentina:

- There are no rules or regulations on testing protocols for private and public companies.
- Labor code does not establish any reference to the topic of alcohol and drugs at work. The full labor code is available at: <http://www.infoleg.gov.ar/infolegInternet/anexos/25000-29999/25552/texact.htm>
- To ship human samples out of the country, you must have a certification from the Administración Nacional de Medicamentos (ANMAT), equivalent to FDA in the United States. If you want to collect samples and ship them back to the United States, you must pay around \$50USD.

For more information: www.sedronar.gov.ar ; www.observatorio.gov.ar

Colombia:

- There are no rules or regulations on testing protocols for private and public companies.
- Labor Code: Forbids working under the influence of alcohol or drugs but does not specify protocols to prevent or test for drug use at the private and public companies.
- Presidential Decree (P.D.) 1.108: Forbids drug use at work for workers whose activity involves risk and public safety.
- Contractors of large oil companies, aviation, and mining industries must be accredited under the Record Management System Occupational Health, Safety, and Environment (R.U.C.), which administers the Colombian Safety Council. To get the R.U.C. you must have a Drug and Alcohol Policy.

In Summary

There is a potential new epidemic of crack plus in South America that is spreading worldwide. We have documented the problem, and now need to develop prevention, drug and additive testing, and treatment programs to address this new epidemic.

There are no rules or regulations on testing protocols for private and public companies in South America. There is opportunity to establish workplace testing standards in this region to promote public health and safety. Many companies, including third party administrators (TPAs) in the United States, are starting up in South America with the vision that drug testing will be mandated and used as a cost reduction strategy in local and international businesses.

Private companies that use workplace drug and alcohol testing in South America are usually multi-national companies. This accounts for less than 8% of the companies in the region. Chile is one of the most advanced countries in the region and is working to establish a national standard for drug-free workplaces.

The labor codes in the majority of South American countries do not have specific laws related to drug and alcohol testing at workplaces. The situation of South America is similar to that of the pre-1980s American drug-testing situation, when there were no national standards for drug collections or testing.

Some South American countries are well aware of the correlation of abuse of alcohol and drugs in relation to accidents and other costs. They are interested in drug-testing programs, but it is a slow process that is just starting to evolve. Drug education, testing, and prevention is not given the same relevance and importance to public health, safety, and business profitability that it has been given in the US and European countries.

With industries like mining, construction and transportation, there is an increasing demand for knowledge regarding the consequences and cost benefits of drug testing. It is with informed leadership within this region that drug education, testing, and treatment is to insure the health and safety of its citizens in this new epidemic of crack plus that is affecting not only nations in South America but nations worldwide.

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Conflict of Interest

I declare that I have no proprietary, financial, professional, or other personal interest in any product, service, and/or company that could be construed as influencing either the position presented in, or in the review of, the manuscript entitled “Drug Testing in South America and the Potential New Crack Epidemic-“Crack Plus””

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The most effective ‘drug pushing’ measure ever – permission: The real subtext of the decriminalization push

Shane Varcoe

There is a maxim that remains constant in our consumerist culture; ‘*availability, accessibility* and of course the key component *permissibility* all increase consumption’.

I was speaking with a close friend who spent years in the horse racing industry and he told me the story about the advent of TAB betting outlets and the reason why they were introduced.

The strategy was to set up government controlled facilities that would enable people to gamble on the horse races in a more ‘scrutinized’ and accountable manner. So to introduce state sponsored gambling they had to have ‘safe-guards’ in place, such as;

- a) Must not be within 200 metres of a hotel
- b) Must not be within 200 metres of a church
- c) Automatic Teller Machines or other money distribution mechanisms not permitted at race tracks.

Sounds wise, reasonable, especially to ensure some modicum of ‘harm minimisation’ was in place. For those at all familiar with this race betting industry, you know that all of these ‘harm minimising’ measures have long since fallen by the wayside. Consumer demand insisted on it. The thin end of the wedge went deep and went fast!

Now we see....

- a) Rows of ATM’s at racetracks
- b) Gambling facilities and hotels merged into an indistinguishable melting pot of ‘alcohol enhanced’ entertainment
- c) Churches... sorry, what about them?

Now in this scenario, *permission* to gamble already existed, but it was *access* and *availability* that changed to increase its incidence.

So, will this increase in both use and uptake happen with decriminalizing drugs? Of course not, so says the pro-drug lobby! But why would this arena be any different than with the race betting industry as described above?

The emergence of a new drug genre, 'Novel Psychoactive Substances' (NPS) gives us a clear indicator of whether decriminalizing current illicit drugs will promote usage; the colloquial 'tag' given to these ever-morphing chemical cocktails is the giveaway –'Legal Highs'. The idea that one may be able to get a 'buzz' without breaking the law is a 'permission slip' for, if nothing else - a 'guilt free' try. Social prohibitions that are informed by not merely health and safety, but economic/productivity values do influence decision making. However, once these are viewed by the egocentric and 'care-less' social isolationist, as arbitrary, and personal 'taste, mood and urge' become the informing agents of policy, then removing illegality gives a further 'push' toward use.

This is not just social theory! A very recent (and first of its kind for Australia) survey/study conducted by Dr Monica Barratt from National Drug Research Institute (Curtin University in Melbourne) reveals some, albeit unintentional, findings. The research, published in Australasian Professional Society on Alcohol and other Drugs, '*Drug and Alcohol Review*' revealed not only the impact of synthetic cannabinoids, but the reasons for uptake. Not surprisingly, the top reason for trying this substance was 'Curiosity' which 50% of those surveyed admitted as the motivation for engagement with the substance. However, it is reason two and three that reinforce what we have always known, 'permissibility, accessibility and availability, all increase consumption.'

The research revealed that 39% of these first time users did so because of its perceived 'legality' and 23% took it up because it was 'available'.

Let's turn this axiomatic formula to the legal drug of tobacco. Certainly more than permission for use of this substance has existed for over a century. There was a sociable 'insist-ability' to partake - it was high fashion. At one point, some medical doctors were prescribing cigarette smoking as a stress management tool.

The growing and relentless assault against tobacco via the *QUIT* campaign in Australia is well known. This vital and effective demand-reduction and education '*crusade*' that is raging against tobacco has continued to burgeon, evermore aggressively to the veritable '*war*' we now see today.

There is no guessing what the outcome of this assault on this 'legal' drug is to be. The message and mandate, at least in Australia, is not 'slow down', it is not 'moderate', it is *QUIT*. The end game is the only game. This aggressive campaign is working – more and more Australians are quitting!

However, as successful as this message has been, the fight is not over yet, as the following excerpt so irrefutably affirms. .

*“ANTI-SMOKING campaigners have far from finished their **battle** with the tobacco industry, with some pushing for a "license to smoke" and many predicting that cigarettes could be outlawed within a decade.”² (emphasis added) (from a recent article in The Age Newspaper, with the opening statement ‘**Now butt out: new push seeks to outlaw cigarettes**’)*

The article went on to note that if such a ban were to take place, the government would stand to lose around \$6 billion dollars in tax revenue, but save an estimated \$31 billion dollars currently spent per annum on smoking related health problems.

No doubt to everyone who is not a smoker, this makes good health and fiscal sense - maybe even to some smokers too?

So how is it that we have managed to convince a society that a ban could actually be possible on a legal drug - tobacco, that in its boom era (during the 40's, 50's and 60's) was a key social accessory? A quick inventory of the processes engaged may give us some insight:

- A clear and uncompromising acknowledgement from health, government and fiscal sectors that cigarette smoking was damaging our community.
- The ensuing resolve that this must change for both fiscal, but more importantly, health reasons.
- The continuing single voice of disapproval of cigarettes from academics, politicians and health professionals.
- The sustained political will to create and implement policies to bring about change, including increased taxation, total advertising ‘blackouts’ and bans – that’s right, ‘prohibition’ on smoking in defined places.
- These have been followed by the creation and implementation of demand reduction strategies that only grow in number and intensity; including health warnings and plain packaging on cigarette packets; and the relentless public education campaign on the dangers of smoking.

It would appear from both anecdotal and empirical data that such resolute policies work, even with a once widely accepted and socially palatable ‘legal drug’ like tobacco.

However, how can such a relentlessness, ‘war’ on this ‘legal’ drug – tobacco, of which some 17% of Australians still use, be not only waged, but affirmed; while at the same time an apparent ‘war’ on illicit drugs be waged, declared ‘lost’ by noisy protagonists and discounted as no longer a worthy strategy? Especially, when statistically less than 6% of the world’s 16-65 year olds have tried or may be using some illicit drug intermittently. Why would one give up on changing that statistic; wouldn’t

it make sense to reduce that 6% statistic to prevent it from increasing? Instead, we hear from a very small, but noisy minority, a call to stop the all but non-existent war on drugs through decriminalisation or legalisation.

If you are an architect of such a blatant drug ‘push’ exercise, you must...

- a) Cultivate the message that drug use is ‘normal’, everybody is trying it!
- b) Cultivate a notion that some drugs are harmless and drug use is manageable, no different to alcohol or cigarettes.
- c) Set up the ‘couch of credibility’ for some drugs by declaring them ‘medicine’. For example push the following specious logic; *Cannabis can be used for some medical purposes, therefore marijuana is medicine, therefore marijuana is healthy, therefore marijuana is ok to use!*
- d) Have ‘celebrities’ and ‘doctors’ come out with claims of functional drug use, giving credibility to the ‘product’.
- e) However, the real key is, if these elements are going to get real traction, you must have an easily to manipulate demographic. To do that you have to ‘set people up’, particularly the young.

In our current selfist culture, the plumblineline for right and wrong has been ostensibly removed. There is no one unified ‘moral code’ to keep other than ‘one’s own’. It is Generation Y and the emerging generation who are best set up for this manipulation. Add to that the attentive issues of a ‘fun focused’ pop-culture, ruled by an ever-distracting technocracy and you have a demographic easy to ‘play’ in a well-pitched market scenario. When selfism erodes our sense of the common good, we are left with only one vehicle to somewhat order society, the **rule of law**.

The prominent Statesman Edmund Burke made this clear...

“Human Beings are qualified for liberty in exact proportion to their disposition to put moral chains upon their own appetites... Society cannot exist, unless a controlling power upon will and appetite be placed somewhere; and the less of it there is within, the more there must be without. It is ordained in the eternal constitution of things, that men of intemperate minds cannot be free. Their passions forge their fetters.”

Of course then comes the next question; what law and who gets to make it?

The following are a couple key scenarios that leave us little ‘wobble-room’ for the idea of abandoning criminal sanctions on drug use, let alone the unthinkable society-wide and ultimate ‘drug pushing’ scenario of legalisation.

A basic principle of good democratic and functional communities relates to foundational governance issues. When it comes to legislation, what principle/s should it be founded on, or at least informed by?

Gus Jaspert the Deputy Director of UK Home Office speaking at the 3rd World Forum Against Drugs, declared...

Governments should aim to...

- a) *Protect their citizens from harm.*
- b) *Provide environments that enable its citizens to reach their full productive potential.*

Any legislation must be filtered through these two foundational principles and the tough questions asked of any proposed introductions or amendments that may breach these principles.

So follow the questions...

- a) Does illicit drug use cause harm to citizens?
- b) Does illicit drug use impede/diminish the productive potential of a nation's citizens?

Subsequent to these basic questions one then must also ask...

- Will widening illicit drug accessibility, permissibility and availability, improve the safety, amenity and wellbeing of any or all of a nations' citizens?
- Will widening illicit drug accessibility, permissibility and availability, improve familial and community functionality, harmony and cohesiveness?
- Will widening illicit drug use improve or put greater burden on the physical, emotional and mental health of our community?
- And last, but by no means least, will widening illicit drug accessibility, permissibility and availability improve or diminish the well-being and safety of our nation's children?

These last two questions are most important to answer, not only on their own merit, but also within the context of other social justice and social responsibility charters, being a) good professional health care/management and b) nothing less than the United Nation's Convention of the Rights of the Child.

A précised, but lucid look at professional health management strategies of functional societies reveals that all measures and means be taken to maximise community health for one primary reason (other than well-being of its citizens) and that is good fiscal policy. Healthy people not only save-society immense amounts of money, but contribute more productively to its growth and improvement.

In answering the questions; does illicit drug use cause harm to citizens, and does it impede/diminish the productive potential of citizens, the following data is evidence enough for governments to move against illicit drugs to protect its citizens against such harms:

“Illicit drug use shaves approximately 13 million years off the world’s collective drug users lives.”³

“Americans spend approximately \$65 billion per year on illicit drugs,⁴ but the costs to society from drug consumption far exceed this amount. Illegal drugs cost the U.S. economy \$98.5 billion in lost earnings, \$12.9 billion in health care costs, and \$32.1 billion in other costs, including social welfare costs and the cost of goods and services lost to crime.”⁵

“Principle 16 - Research-based prevention programs can be cost-effective. Similar to earlier research, recent research shows that for each dollar invested in prevention, a savings of up to \$10 in treatment for alcohol or other substance abuse can be seen (Aos et al. 2001; Hawkins et al. 1999; Pentz 1998; Spoth et al. 2002a; Jones et al. 2008; Foster et al. 2007; Miller and Hendrie 2009).”⁶

“The success of demand reduction in the US is reflected in long-term decreases in rates of illegal drug use. The percentage of persons aged 12 and older in the US who used an illegal drug in the past 30 days has decreased 38% from its peak in 1979 (14.1%) to 2009 (8.7%). Equally impressive are statistics from the United Nations Office on Drugs and Crime (UNODC), which has documented a greater than 80% reduction in annual opioid use over the past century!”^{7,8,9}

Yet, there is more to professional health management strategies than economic rationalism. Disease control is a primary goal of good health management policy/strategies. Eradication of any disease is the ultimate goal, but in the interim, management practices can be used with an attempt to alleviate symptoms and to improve health status, enabling best opportunities to work toward recovery and wellness. When there is any option for recovery/wholeness, then that becomes the goal.

Illicit drug use dependency has now been widely touted as a ‘disease’ and as such the term ‘disease’ has an ever morphing definition in various diagnostic manuals. Regardless of the definition, treatment principles still remain the same – the containment, cessation and future prevention of this disease. Two key factors must be addressed if any sort of positive health outcome is going to be achieved...

- a) Susceptibility factors of the patient
- b) Exposure factors to the patient

So in treating the disease of drug dependency/addiction, one must address both of these factors to have best hope of the drug user becoming healthy again – The health that a) saves money b) keeps you from harm c) enables your full productive potential d) adds to your and the communities general well-being.

The question we now have to ask of any measure that will increase accessibility, permissibility and availability of illicit drugs is, will it *exacerbate* or alleviate a) susceptibility factors and b) exposure factors? If it does the former, then we have breached good, professional and fiscally responsible health care practice. Any action/method/process that enables the increase or worsening of these two factors is at best reprehensible and at worst culpable and worthy of malpractice lawsuits and license revocation.

When it comes to the mental, physical and emotional health of society's citizens and particularly its children, any measure that increases the exposure or susceptibility to a disease must be, if not eradicated, at least contained. To do less is to collapse the very core of what good governance and good health care strategy is for a nation.

When the already available, well managed and effectively deployed 'exposure' preventing tool of *criminality* is employed, we come close to achieving best potential for full recovery. Removing this proactively used mechanism will contribute to the opposite in a community.

In summary, when it comes to the notion of drug decriminalisation or legislation and the key issues that we have looked briefly at here, we need to ask....

- a) Will decriminalisation/legalisation of currently illicit drugs increase the harms to citizens, the children and their productivity/potential?
- b) Will decriminalisation/legalisation of currently illicit drugs make for better health care policy/practice and outcomes?
- c) Can criminal sanctions be used effectively, not as a punitive sanction, but as a collaborative vehicle to enable both unwitting casualties or even recalcitrant purveyors of drug disease to not only diminish harms to the wider society and themselves, but more importantly to discover the potential and productivity that both functional society and good government endeavour to promote?

It is clear that when societal expectations and conventions of protection, safety, productivity, health and wellbeing are breached by its citizens, then sanctions are not only expected, but demanded. Why remove a mechanism (criminality) that has the proven potential (when used proactively for care i.e. diversion/rehabilitation) to provide safety, promote recovery and more importantly promote wholeness?

I will conclude with a quote from one of the 'fathers' of modern libertine ideology, John Stuart Mills.

No person is an entirely isolated being; it is impossible for a person to do anything seriously or permanently hurtful to himself without mischief reaching at least to his near connections, and often far beyond them...If he deteriorates his bodily or mental faculties, he not only

brings evil upon all who depended upon him for any portion of their happiness, but disqualifies himself for rendering the services which he owes to his fellow creatures generally, perhaps becomes a burden on their affection or benevolence; and if such conduct were very frequent hardly any offense that is committed would detract more from the general sum of good.

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