# REPORT OF PROCEEDINGS BEFORE

# LEGAL AFFAIRS COMMITTEE

# INQUIRY INTO LAW REFORM ISSUES REGARDING SYNTHETIC DRUGS

At Sydney on Monday 22 October 2012

The Committee met at 11.30 a.m.

## **PRESENT**

Mr D. F. Perrottet (Chair)

Mr C. G. Barr

Mr S. B. Bromhead

Mr B. M. Doyle (Deputy Chair)

Ms S. K. Hornery

**CHAIR:** Good morning, and thank you for attending the second public hearing of the Legal Affairs Committee on law reform issues regarding synthetic drugs. Today the Committee will be hearing from the NSW Police Force, the New South Wales Department of Health and the New South Wales Department of Attorney General and Justice. We will also be hearing from Ms Monica Barratt, a research fellow with the National Drug Research Institute at Curtin University, and Mr Paul Dillon from Drug and Alcohol Research and Training Australia. I now declare the hearing open. In opening the hearing, I remind everyone to switch off their mobile phones as they can interfere with the Hansard recording equipment.

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**NICHOLAS CLIFFORD BINGHAM**, Detective Superintendent, Commander of the New South Wales Police Force Drug Squad, affirmed and examined:

**CHAIR:** I welcome our first witness who is from the NSW Police Force, Detective Superintendent Nick Bingham. Mr Bingham, do you have any questions concerning the procedural information sent to you in relation to the witnesses and the hearing process?

Mr BINGHAM: No. I am fine, thanks.

**CHAIR:** Would you like to make an opening statement before we begin?

**Mr BINGHAM:** I would, if you don't mind. It will take approximately five minutes. In response to concerns about its misuse and effects, on 8 July 2011 the New South Wales Government banned the sale, possession and use of seven synthetic cannabis products that contained certain chemical compounds and were added to schedule 1 of the Drug Misuse and Trafficking Act. NSW Police has been advocating for change on this issue for a significant period of time. It is also a standing agenda item at the Intergovernmental Committee on Drugs, which has representatives from the NSW Police Force and NSW Health.

While the intent of the legislation was to ensure synthetic cannabis products were treated as prohibited drugs and in a similar fashion to cannabis and the law relating to possession, use and supply, the threshold quantities applying to synthetic cannabinoids are out of step with cannabis. To demonstrate in relation to cannabis, in schedule 1 to the Drug Misuse and Trafficking Act a small quantity of cannabis is 30 grams, a trafficable quantity is 300 grams, and an indictable quantity is 1,000 grams. In comparison, in relation to synthetic cannabinoids, a small quantity is one gram, a trafficable quantity is three grams, and an indictable quantity is five grams.

It was believed that banning seven compounds would see most products on the market containing different compounds. We are still seizing products that do contain the banned substances. It is my understanding that there are over 200 compounds or possibly hundreds more that can be used which have the same or similar effect, and while we are still seeing the seven that have been added to the Drug Misuse and Trafficking Act schedule, we are also seeing other compounds identified as synthetic cannabinoids but not banned in New South Wales, or most or some of them are banned in other States.

At this time it would be very difficult to identify every compound, but it may be possible to identify the chemical family in which the compounds reside. One of the main issues, though, is that our Forensic and Analytical Science Services [FASS] requires the analytical standards for seven banned compounds to provide evidentiary certification. The Forensic and Analytical Science Services would need to be consulted to determine what standards would be required for the larger synthetic cannabinoid family and what impact this would have on their operations. It may require a legislative amendment in relation to analysis of these substances so that the normal operations of the Forensic and Analytical Science Services do not get bogged down.

After 8 July last year, all police were made aware that the seven banned compounds articulated in the Act were to be treated essentially as mainstream illicit drugs, although not subject to a cannabis cautioning program. Since that time, it appears that retailers have restocked with products that are marketed as legal and said to contain none of the banned substances included in their composition. This may or may not be the case. However, in many cases the banned substances have been detected. It is unlikely that this is old stock, given the Eros Association, which represents many of the retailers and distributors, advises that these products fly off the shelf.

The advice that the NSW Police currently provides to its officers is that if they have reasonable grounds to suspect that a substance contains one of the seven banned compounds, it can be seized under legislation. It should then be treated as a drug exhibit and analysed. Further advice we provide is that if the person who possesses the substance advises that they purchased it as a result of marketing advice that it does not contain any of the banned compounds and/or that packaging or advertisement expressly states that compounds contain none of the banned compounds, police should not seize it. The reasons are: firstly, the state of the mind of the person possessing the substance gives rise to an immediate defence in that they do not believe they possess a prohibited drug; and, secondly, it is possible the substance, especially if still packaged in its most recent incarnation, does not contain any of the banned substances.

The obvious implication is that it is impossible for a police officer to differentiate. It requires laboratory analysis to show what compound is being used. Even an admission from the person possessing the substance that it is one of the synthetic products they knew is banned is problematic as it is unlikely they would know the chemical make-up. The way that synthetic cannabinoids are supplied in the market is more closely aligned with tobacco and alcohol markets than with illicit drug markets. There is no doubt this is part of their appeal to many users. Synthetic cannabinoids can be easily sourced through shops and online retailers without the difficulties and risks associated with identifying and accessing illicit drug dealers. In contrast with the tobacco and alcohol industries, though, there are no effective mechanisms in place to control quality and distribution, or to minimise harms to individuals and communities by means of labelling and restrictions on sale.

From July 2011 to December 2011, NSW Police reporting periods shows there were 168 detections of synthetic cannabinoids. Of those occurrences that detailed the brand of synthetic cannabinoid, 28 different brand names were identified, though the majority were found to be K2 and Kronic, 41 per cent and 36 per cent respectively. In the first half of this year there have been 106 seizures, and for the year to date from 1 January until now, there have been 171 seizures, mostly of the products Kronic and Ash. When analysed at the Forensic and Analytical Science Services, all but a very small number of samples contained one or more of the banned substances or cannabinoids that are not banned but are likely analogues, which I will get to shortly.

Just to put that into context in relation to seizures, there were 106 synthetic cannabinoids seizures from January to June this year. With our mainstream illicit drugs, for cannabis there were 8,426 seizures; amphetamines, 2,448 seizures, 3,4-methylenedioxymethylamphetamine [MDMA] or ecstasy, 1,060; heroin, 572; cocaine, 434; and other drugs, 1,343. Other drugs are mainly benzodiazepines and some of the opioid families. By comparison, it is small, but then that may have a lot to do with our advice in relation to seizure as well—that they have to be quite sure it is a prohibited drug.

It is not currently an offence to possess other variations of synthetic cannabinoids not specifically listed in schedule 1 of the Drug Misuse and Trafficking Act. A number of companies have altered the ingredients of their products to ensure that they do not contain any of the prohibited substances. However, issues surrounding inaccurate labelling, lack of ingredients on the label and inconsistency of ingredients in the products makes it difficult for police to accurately determine whether or not substances they encounter are banned forms of synthetic cannabinoids. Analysis of individual samples is necessary to determine for certain whether a product contains any banned substances.

In order to seize products, police must first have reasonable grounds to suspect that the synthetic mixture does in fact contain one of the banned cannabinoids. As many of these drug analogues are newly emerging, there is limited research or knowledge about the short- or long-term health consequences of use, the risk of dependence, possible adverse effects of use in combination with other drugs, or the potential fatal dosage levels. The health-related problems associated with the use of synthetic cannabinoids have been reported to be similar to those after cannabis use, but also include adverse reactions. Only Friday of last week, police attended a high school in Sydney's north-west after two students were reported for erratic behaviour after smoking the Ash products that were bought locally.

Psychological disorders, such as panic attacks, were among the frequently reported symptoms. These symptoms are also likely to occur after cannabis use in naive users or after using relatively high doses. Another potential problem observed is the unknown cumulative toxic effects these compounds may have. As a result, the severity of short-term effects experienced by synthetic cannabis users is a concern to Health and Police. If synthetic cannabinoid use increases, it is likely that the health cost and community impact will increase as a result of the similarities in effects between cannabis and synthetic cannabis.

The emergence of synthetic cannabinoids and other substances has challenged existing notions and legal definitions of what constitutes a drug and how emerging drugs can be managed effectively. Schedule 1 of the Drug Misuse and Trafficking Act includes a paragraph relating to analogues in that substances that are chemically very similar to prohibited substances are also considered to be banned. That said, the analogue clause is extremely technical and virtually incomprehensible to most without a chemistry background; so, if the drug is not specifically listed in Schedule 1, there are difficulties encountered when having these substances analysed at the Forensic and Analytical Science Services as the Forensic and Analytical Science Services analysts record that no prohibited drug has been detected, and the police then need to rely on a forensic pharmacologist to provide a statement that this substance is covered under the analogue provisions of Schedule 1, due to having psychotropic properties.

The Forensic and Analytical Science Services has resolved this problem partially by providing certificates of analysis to show the substance is an analogue. However, if police are held to strict proof in court, a forensic pharmacologist would have to be called. Synthetic cannabinoids are not analogues of cannabis or tetrahydrocannabinol [THC]. They mimic the effects of THC while having a completely dissimilar chemical composition. In addition, many of the 200 or more synthetic cannabinoids are very different to each other. Because of this, synthetic cannabinoids are not automatically covered by analogue provisions, and adding one synthetic cannabinoid to the Drug Misuse and Trafficking Act does not mean that other synthetic cannabinoids are also covered.

Challenges will continue with regard to effectively managing the potential harms caused by synthetic cannabinoids and the policing and analytical issues. To date, the States have attempted to address the emergence of synthetic cannabinoids through their drugs or poisons laws by focusing largely on supply issues. As you are aware, though, there are alternative approaches that might be considered when new substances emerge onto the drug market. For example, New Zealand has taken a novel legislative approach to synthetic cannabinoids, targeting producers and focusing primarily on health and safety by creating temporary class bans on products while harm issues are being assessed. I note this is something that is agreeable to the representatives of synthetic cannabinoid retailers, suppliers and manufacturers, and suggest that New South Wales take a similar stance.

The cost of testing these products should be borne by those wanting the product on the market. In addition to testing in relation to adverse health outcomes, testing should also be done in relation to impairment. There is plenty of literature to suggest that cannabis does have adverse affects on fine motor skills and would affect driving skills. There is no reason to suggest that synthetic cannabinoids, which attract themselves to the same receptors in the brain, would not have a similar impairment effect. What is also important, and could be applied to New South Wales law, is the grey area surrounding knowledge in relation to what substances contain.

Consideration should be given to prosecuting supply or manufacturing offences but use and possess offences could be treated by way of seizure of the substance only. This would alleviate investigation and prosecution time and not criminalise users who believe they are buying a legal product. There are also other frameworks for managing substances that people consume, most notably, those regulating foodstuffs, tobacco and alcohol. If not regulated or prohibited, we can expect the continued emergence of these substances for recreational use, each with different profiles regarding toxicity, dependence and other harms. In light of this, it may be useful to consider when regulation is the most appropriate response and when prohibition is warranted.

On 1 May this year the Therapeutic Goods Administration included nine groups of synthetic cannabinoids in Schedule 9 of the Poisons Standard. This broad scheduling aims to capture all synthetic cannabinoid groups in order to address the problem regarding manufacturing altering synthetic cannabinoids to avoid bans and will make it easier to police as police can have confidence all synthetic cannabinoids will be prohibited. Whilst New South Wales automatically adopts the substances captured in Schedules 2 to 8 in the Poisons Standard, legislation needs to be amended to include the substances captured in Schedule 9. If this is done, as with Schedules 2 to 8, Schedule 9 substances could automatically be included when the Poisons Standard is updated.

**CHAIR:** You speak about synthetic cannabinoids. What is your definition of synthetic drugs and what products would fall within that definition? The reason I ask is that a number of submissions we have received, including the New South Wales Government submission, has, like you, focused on synthetic cannabinoids as opposed to other products such as synthetic amphetamines and the like.

**Mr BINGHAM:** There are plenty of other products on the market and there are probably too many to go into. I am not aware of all of them. However, there are mimic drugs that are synthetically made and sold as bath salts or plant nutrients. Some of those drugs are covered already by our analogues legislation—which I mentioned was a bit confusing. Some of those synthetic substances do contain analogues of cathinone or methcathinone, such as the product brands Ivory Wave and Vanilla Sky. Certainly they are a big, if not bigger, concern than synthetic cannabinoids.

They are drugs marketed as mimics to MDMA, which is ecstasy, cocaine or a combination of all of those drugs and also synthetic amphetamines. Whilst I have concentrated on the cannabinoids because they were banned in New South Wales in July last year, certainly the other synthetics are of concern. Only yesterday in the Port Stephens local area command two people purchased a product called smoking slurry, which is said to mimic cocaine. Those people had severe adverse psychotic reactions. It was a male and female and the man is now in a coma with very few vital signs, which is a big concern.

**CHAIR:** The statistics you went through were also referred to in the New South Wales Government submission in terms of the detection of synthetic drugs. What percentage of those detections would be synthetic cannabinoids and are you seeing an increase over time?

**Mr BINGHAM:** All the detections I mentioned were synthetic cannabinoids. I did not bring the detections with me in relation to the other synthetic drugs. I can provide the Committee with those. Certainly there have been quite a few detections of the other mimic drugs as well. We do have the issue of them being treated as analogue drugs.

**Mr STEPHEN BROMHEAD:** Superintendent, you speak about what is happening in New Zealand and the regulation of what we will call an industry. That is the dilemma of prohibition versus regulation. With your experience, would you be advising the Government towards prohibition or regulation?

**Mr BINGHAM:** Initially I would advise prohibition until the substances are tested. If once they are tested there are not adverse effects or impairment effects, it is up to the Government whether they want to regulate and let those products on the market. My initial thought would be prohibition until any harms or otherwise are detected.

**CHAIR:** Mr Bingham, you talk about testing. What do you see as the threshold? From our discussion in the hearing last week with the New Zealand Ministry of Health, they appeared to be of the view that they had not made a determination as to what that threshold should be. What do you think it should be?

**Mr BINGHAM:** I am not qualified to answer that question. That would have to come from a pharmacologist. It is my understanding, and I mentioned a short while ago, it is reasonable to believe that synthetic cannabinoids have at least the same effect that cannabis does. There are obvious impairment issues at the moment with cannabis. Some industries such as the mining industry do not allow employees to go to work under any cannabis impairment. My understanding is that is the same with synthetic cannabinoids. I am a police officer, not a chemist or forensic pharmacologist, so it is hard for me to comment.

**Ms SONIA HORNERY:** You mentioned an incident at Port Stephens on the weekend. Has that been reported in the media? Obviously I am not in Newcastle today. I am interested if there was any media coverage. Did you say it was called "slurry"?

**Mr BINGHAM:** I have not heard any media reports. I had this report from one of my officers this morning who knew I was coming into this hearing. It is a product called "smoking slurry", said to mimic cocaine. It is supposed to be smoked but on this occasion the products were injected. That caused severe adverse psychotic reactions and the man is in a critical condition. It was at Hexham in the Port Stephens local area command.

Mr CLAYTON BARR: Was that product sold legally?

Mr BINGHAM: Yes, it was.

**Mr CLAYTON BARR:** Are the impacts of many of these synthetics presenting in the form of violent crimes by people under the influence?

Mr BINGHAM: Not that I am aware of, no.

**Mr BRYAN DOYLE:** Detective Superintendent, the Committee has received a lot of evidence about synthetic cannabinoid products. Is their use becoming more popular in the community?

**Mr BINGHAM:** We are not seeing that by detection rate but, as I said, we advise police unless they are reasonably sure they are seizing a prohibited product not to seize it. It is my understanding from representatives from the Eros Association that the products are flying off the shelf, which would indicate that there is a large amount of use in the community. We base our figures on detection and/or arrest rates and we are not seeing that.

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**Mr BRYAN DOYLE:** I think you previously mentioned that in July last year the New South Wales Government banned seven cannabinoids in line with other jurisdictions. Can you tell the Committee how long it took retailers to restock their products with other alternate legal versions?

**Mr BINGHAM:** It is my understanding that it was almost immediate. They were not given too much notice but they were given a little bit of notice it was going to occur. It is my understanding that they started a restock almost immediately. Having said that, the majority of the products we have seized since that time have contained some of the banned substances.

**CHAIR:** I refer to temporary class drug orders such as are in effect in the United Kingdom and New Zealand. If such an approach was taken here, what powers would you have in terms of attending a tobacconist or adult book shop where the products are sold and removing those products from the shelves?

**Mr BINGHAM:** If it was one of the products under a temporary class ban, it would give us the power to seize, analyse and prosecute, if required.

**CHAIR:** That is something you would see as within the scope of the powers provided: Those police officers would attend such retailers and remove these products immediately from the shelves until such time as they were tested?

**Mr BINGHAM:** Yes. If it was one of the substances under the temporary class ban, yes, we would. If it was not one of those substances we would leave them alone.

**CHAIR:** "Substance" meaning product—how are you able to determine what is actually within the packets on the shelf?

**Mr BINGHAM:** That is the difficulty. It was my understanding from the retailers and distributors that they would be proposing when a product is put on the market that product would not go on the market until it was analysed and tested for harm. It is my understanding until that happened there would not be any products on the market. I believe that is what is occurring in New Zealand at the moment.

Mr BRYAN DOYLE: Superintendent, are you finding many of those products being sold to children?

**Mr BINGHAM:** With the incident I mentioned in relation to north-western Sydney, it was sold to schoolkids. I am not trying to demonise the retailers because it seems that most of retailers are trying to do the right thing. Even though there is no regulation at this stage similar to tobacco or alcohol, it is my understanding that they are generally loathe selling to children and generally sell to adults. Most of the products are sold through adult book stores or tobacco retailers themselves.

**Mr BRYAN DOYLE:** You mentioned earlier that synthetic drugs have been an issue for mining companies. The NSW Police Force also provides a drug-free workplace. Have synthetic drug products caused any problems within the NSW Police Force that you are aware of?

**Mr BINGHAM:** Not that I am aware of but there is no testing regime either.

**Mr CLAYTON BARR:** Mr Bingham, in a practical sense, if a product is seized and sent off for testing what is the turnaround on that and are there any implications for a police officer getting that wrong? Is there any recourse if they happen to make the wrong decision?

**Mr BINGHAM:** First, to address the length of time: It would take anywhere between three and six months for a non-urgent analysis. The implications are that if the police officer seizes a product and charges someone without an analysis being done, that means a person has gone through at least the police system and has been put through the charge room and experienced the entire trauma that entails without even prima facie evidence that they are in possession of a prohibited drug. Our advice is that if you are going to seize then seize it, have it analysed but do not charge until the product comes back as a prohibited drug. Certainly that is not happening in every case.

**CHAIR:** You speak about the fact that you need to have a degree in chemistry to interpret Schedule 1 of the Drug Misuse and Trafficking Act.

#### Mr BINGHAM: Yes.

**CHAIR:** What is your overall view in terms of the current law in the Drug Misuse and Trafficking Act, its effectiveness and potentially the need for greater clarity in the area?

**Mr BINGHAM:** I think it can cause a technical argument that is better not being had at all. If we could simplify the analogue clause to being defined as, "structurally similar to a prohibited drug or a substance that is supplied with the effect of, or the intended effect of, or the purported effect of a prohibited drug," that would simplify things greatly and cut out any technical argument. Take away the psychotropic properties issue and talk about structural isomers. The chemical jargon is required there at some stage but I think even the Young Lawyers say that something needs to be done in relation to the technical jargon used in that clause.

**CHAIR:** The New South Wales Government submission referred to potentially not removing the psychotropic clause. They also say they are of the view that you could implement a test to see whether or not the effect on receptors in the brain after taking these products is similar to the effects of tetrahydrocannabinol [THC]. Would you say, based on your opening statement, that the effects of these products can vary so greatly that such a test would have little effect on the success of the legislators?

**Mr BINGHAM:** Yes, it is my understanding that some of the synthetic cannabinoid products can have no effect or can have hundreds of times more than THC. It is the view of NSW Police that "psychotropic" be taken from the analogue clause; that it just be removed. I know that may not have been the whole-of-government approach but that was a combination of the departments' submissions, it is my understanding. The submission of NSW Police was to remove the psychotropic issue. I am advised from our pharmacologist friends that it is difficult, if not impossible, to prove psychotropic unless you have a human trial. It is not ethically possible, it is my understanding, to do that with people; therein lies the problem.

**CHAIR:** In terms of the approach that you believe we should take, you touched on the New Zealand approach. Do you think this Committee should make a recommendation at a Federal level to trial an approach similar to that taken in New Zealand? Outside New Zealand, what other approaches internationally do you think this Government should look at to tackle this issue?

**Mr BINGHAM:** Yes, I think the New Zealand approach is reasonable. I think a retailer, distributor or manufacturer who wants to put a product on the market, regardless of what the product is, the onus should be on them to ensure that product is safe. I think the approach New Zealand has taken to do that is reasonable. I also think the approach New Zealand has taken in relation to use and possess not being an offence is also reasonable for the reasons stated previously in my submission in relation to state of mind of the person purchasing the products and the legal issues around how the products are marketed, and a reasonable belief that a person, a buyer, would think that they are a legal product. The only other one I have looked at internationally is the United Kingdom approach in relation to temporary class bans. I believe that they are also not making it an offence to use and possess, only making the supplier or manufacturer liable in relation to offences.

**CHAIR:** In New Zealand the view is that the testing of a single product could cost a manufacturer up to \$2 million. The Eros Foundation is of the view that cost would not be an impediment for them. That gives us some idea of the value of the industry. What concerns do you have in relation to these products being tested and subsequently approved, and a market being created for these products within New South Wales?

**Mr BINGHAM:** If a product is tested and it comes back that it has no adverse health effects or no impairment issues I would not then have a problem with the product being sold. Realistically, I cannot see that happening, given the nature of the history of these products and the fact that they do bind to the cannabinoid receptors in the brain and they are marketed as psychoactive products. I really cannot see that happening. If it comes with no adverse effects, I have no problems, certainly it would free up policing time.

**CHAIR:** Mr Bingham you have taken a question on notice in respect of products outside of synthetic cannabinoids that fall within the category of synthetic drugs. Once the Committee has concluded its hearing today it may have further questions of you, and any responses that you may give will become part of your evidence. Are you happy if there are any further questions that arise that we write to you in respect of those?

**Mr BINGHAM:** That is fine.

(The witness withdrew)

**DAVID ANTHONY McGRATH**, Director, Mental Health and Drug and Alcohol Programs, NSW Ministry of Health, affirmed and examined:

**BRUCE LYNDSAY BATTYE**, Deputy Chief Pharmacist, Regulatory and Legal Services Branch, NSW Ministry of Health, sworn and examined:

**CHAIR:** Do you have any questions regarding procedural information sent to you in relation to witnesses and the hearing process?

Mr McGRATH: No.

Mr BATTYE: No.

**CHAIR:** Do you wish to make an opening statement?

**Mr BATTYE:** Yes. In relation to the synthetic cannabinoids, the regulation of them would fall essentially outside the Ministry of Health. If there is going to be regulation of those I believe it should be under the Drug Misuse and Trafficking Act, keeping in mind that the regulation of medicines and poisons under the Therapeutic Goods Act which is regulated by the Ministry of Health are for legitimate medicines and not prohibited substances.

**CHAIR:** The Committee received a submission from the Western Australian Drug and Alcohol Office in which it spoke about a group it has set up called Emerging Psychoactive Substance Review Group, which includes members from the Western Australian Police, the Department of Health, the Western Australian ChemCentre, the Department of Commerce and Customs and Border Protection. The view of setting up that group was to advise on developments in respect of synthetic drugs and their effects. Has the NSW Department of Health considered setting up a similar group? Do you have any information in respect of the findings so far from the Western Australian group?

**Mr McGRATH:** I have no knowledge of the findings of what the Western Australian group has found, other than what they would have reported through the Intergovernmental Committee on Drugs. I should point out that the Western Australia Drug and Alcohol Office is a whole-of-government entity and not a Health-specific entity. So it has responsibility across government. Within the NSW Ministry of Health we have not made any determination to set up a similar group. It may be a question better addressed to the Cabinet Office or to a whole-of-government agency rather than to the Ministry of Health per se.

**Mr BRYAN DOYLE:** Would you outline to the Committee your understanding of what types of drugs encompass the term "synthetic drug"?

**Mr BATTYE:** The term "synthetic drug" could be any medical substance which modifies the body in some way. The great majority of legitimate pharmaceuticals are synthetic drugs. I think in the context that we are here today what we are talking about are chemicals which are, presumably, manufactured outside of the normal regulatory regime, in possibly China or some other overseas countries.

**Mr BRYAN DOYLE:** Would you provide to the Committee your understanding of the challenges associated with these synthetic drugs?

Mr McGRATH: Many of the challenges are from a law enforcement perspective. Obviously, the difficulty in being able to define these substances within a framework that allows law enforcement to regulate them appropriately is one of the fundamental challenges. One of the challenges from a health perspective is there is evidence that these particular substances are stronger or more effective in binding the cannabinoid receptor sites than the naturally occurring plant material. So, therefore, there is some evidence—and I must say it is not equivocal—that these particular substances bind better to the cannabinoid receptor sites and therefore create a more profound effect and, therefore, have more significant health impacts.

This is an area within the Health space where the particular compounds themselves are changing relatively frequently and so the impacts of individual compounds are difficult to measure over a period of time because some compounds drop out of the market as a result of different regulatory effects. But nonetheless,

there does appear to be some evidence that some of the compounds that have been available are more effective in binding to the receptor sites in the brain.

**Mr BRYAN DOYLE:** You mentioned there is some evidence in relation to synthetic cannabinoids. Has NSW Health considered researching this issue? Has any research been conducted within NSW Health?

**Mr McGRATH:** We have not conducted any research. Obviously that would be difficult to do within the frameworks I just described. Those substances that are illegal, obviously it is very difficult for us to conduct biological research with substances that are no longer in our legal framework. Those that are not are newly occurring substances so the capacity to do that is somewhat limited in terms of access to the actual substances themselves.

**Mr BRYAN DOYLE:** If these substances can actually bind the receptors more effectively, does that make them, de facto, more addictive? What is the effect on the recipient?

Mr McGRATH: Not necessarily more addictive. Mr Battye, obviously being an expert in pharmacology, could correct me where I am wrong, but the binding of the receptor sites is more about effectiveness than addictiveness. Addictiveness is often around the half-life of a given medication; the shorter a half-life of a given medication the more addictive it is. For instance, nicotine has a very, very short half-life and therefore the repeated administration required of that particular medication makes it a more addictive substance than a substance that has a longer active effect. If you look at some of the comparators in the opioid space, heroin as an opioid substance has a very short half-life. That is one of the reasons—and there are many others that I am sure Mr Battye will tell you about in a second—it has a higher addictive profile than, say, codeine or oxycontin which have longer half-lives. But it does suggest a more effective binding means it is a more effective drug in achieving its particular aim or intended outcome.

**Mr CLAYTON BARR:** Do we know anything about the half-life or addictiveness of these products, or is that impossible to measure because they change so often?

Mr McGRATH: I do not have any specific knowledge about the half-life of these substances.

**Mr BATTYE:** I do not either.

**Mr CLAYTON BARR:** Mr Battye, I want to ask you a question about testing for these drugs. Can you explain to me why it is so difficult to test? We just heard from the police that it can take between three and six months to test. Can you explain in layman terms why that is the case and whether or not there are any advances on that?

**Mr BATTYE:** I do not think I am qualified to talk about that. I think probably someone from the forensic and science services group would be the person to speak to about that.

**CHAIR:** Both of you are probably aware of the issues we are facing in New South Wales—and we just heard from Superintendent Bingham—in relation to manufacturers being able to change their products to get around schedule 1 of the Drug Misuse and Trafficking Act. There has been a new approach taken in New Zealand, which has just been released, whereby manufacturers would need to make an application and go through an extensive testing period, which would cost up to \$2 million, in order to determine whether or not there are any adverse health effects in relation to these products prior to their being allowed onto the market. The question we asked the New Zealand Department of Health last week was what threshold there would be. What would you see as constituting adverse health effects of these products in respect of that testing?

Mr McGRATH: There are two points I would have to make. One is that I would be uncomfortable commenting on the regulatory responsibility of another agency or another jurisdiction—I would just say that up-front. The second thing is that whatever framework you put that within would need to be in the same context as any other framework applied to health impacts of given substances—that is, you could not look at Kronic in isolation or any of the other synthetic cannabinoids in isolation. So you would have to look at the thresholds within the same framework that you might set for other substances. I would presume the regulatory framework that would apply in this case would not be a framework managed by the Ministry of Health and I again would be uncomfortable about commenting.

**Mr CLAYTON BARR:** In terms of potential medicines coming onto the market, what is the testing process and the standard or indication of harm? How do we decide whether or not a medicine gets the green light or go-ahead?

Mr BATTYE: Before any medicines can be sold on the Australian market they have to be registered on the Australian Register of Therapeutic Goods [ARTG]. You will notice with any medicine that you buy or have dispensed for you, if you look at the packet you will see it has on it an AUST-R or an AUST-L number. That indicates that it is on the Australian Register of Therapeutic Goods. Under the New South Wales poisons and therapeutic goods legislation it is illegal to supply a medicine or offer for sale a medicine that is not on the Australian Register of Therapeutic Goods, so it is an offence. As far as the process is concerned, it is a very involved process for the Therapeutic Goods Administration [TGA]. What they are looking at is the efficacy of the claims, the safety of the product—the safety profile—and they are also looking at quality aspects. So that is the product.

Secondly, the TGA licenses the manufacturers. So if you are a manufacturer of these therapeutic goods then you have also got to be licensed by the Therapeutic Goods Administration. That includes overseas manufacturers where the TGA will go to those overseas facilities and inspect them, and that is an ongoing process where the facilities are audited on a regular basis depending on the risk profile. Some manufacturers may be audited two or three times a year; other manufacturers who have very good processes in place might be audited only once a year. The manufacturers pay for the auditing, so it is an ongoing cost to the manufacturers, and it is a process that seems to work pretty well. Also with the TGA, because the products are on the Australian Register of Therapeutic Goods, if there are any adverse effects that come to light—it can be from overseas information or local intelligence—then there is a recall process which is put into place, and again because they are dealing with a regulated environment, that can be quite efficient.

**Ms SONIA HORNERY:** I am not sure what a half-life is. You gave an explanation about cigarettes, but could you re-explain it in layman's terms, please?

Mr McGRATH: "Half-life" talks about the effective period of time that a dose lasts for a given drug. For instance, with nicotine, when you take a dose of the drug—have a cigarette—the period of time before you need a repeat administration of the drug is relatively short because the effect of the drug wears off relatively quickly over time. The half-life is just a measure of how long it takes for the effect of the drug to wear off over time. Because of that, you need to do repeated dose administrations throughout the day, so the average cigarette smoker would have repeated dose administrations 20 to 25 times a day. There are a whole lot of addictive components to that, changes to your brain chemistry and changes to your behavioural patterns that come with it—habits generally described amongst the smoking population—so that makes it a highly addictive drug because of the repeated dose administration in order to maintain the effects. With a drug like codeine, for instance, there is a much longer period of time that the drug is effective for. So the wearing off of the effect of medication is shorter, say, for an equivalent drug from the same class of drugs like heroin, which has a much shorter period of active life, therefore repeated dose administrations throughout the day, and it has a more highly addictive effect.

**Mr CLAYTON BARR:** We heard earlier from the police that in the last 24 hours there has been a case of a person taking one of these synthetics and being in a coma today because of, I guess, misuse of the drug. In terms of health, are people turning up at our health departments affected in crisis or with short or long-term effects of the drugs?

Mr McGRATH: It is very difficult to be able to pin down the actual type of substance used in a given adverse event for somebody in a health department. Obviously the emergency department staff in an event like the one you have just described are most concerned about identifying what is active in the individual, responding to that and dealing with the health situation. What sort of cannabinoid substance might have been the precursor to that is not generally something that is recorded as part of the intake system. They are more concerned about identifying the source, and more than likely in that particular circumstance it was not the cannabinoid itself—and I have no knowledge of the case you described, so I state that up-front—but it is more likely some other additive that would have caused the sort of outcome you have described and the health staff would have been most concerned to identify the particular substance that was causing the adverse event resulting in that. Emergency department staff are not in a position to get down to the level of fine granularity of detail around what might have been the actual chemical makeup of the compound, which is part of the difficulty in what you are trying to investigate here. There is such a broad range of compounds involved—some of which

are no longer legal, some of which are new and have not been captured by the regulations yet, and then you have plant-based matter.

**CHAIR:** The Government submission in respect of this inquiry spoke of a potential solution for law enforcement would be looking at focusing on the effect of substances on the receptors in the human brain. Since that time, we have taken a trip to the Hunter Valley and met with experts there and we have heard evidence about the different range of effects that these products can have. Do you agree with that and, in those circumstances, do you think that would be an effective approach to take in respect of this issue?

**Mr McGRATH:** I cannot comment on the law enforcement component, but what I could say is that it would be very hard to measure in terms of impacts. You would need to find, within a legal framework, some sort of objective measure of the impacts that allowed you to take appropriate legal action. How you would define those and relate them to the use of a particular substance would be complicated. I do not know if Mr Battye has any thoughts, but I cannot see how you could objectively measure that for the purposes of a legal proceeding.

Mr BATTYE: I would agree; it sounds very complex to me.

**Mr CLAYTON BARR:** Mr Battye, I asked a question earlier about the way we introduce medicines to the market. Is part of that testing regime about the impacts on the brain and the function of the brain and that sort of thing? Is that not part of what we test for during that process?

**Mr BATTYE:** You are talking about getting a medicine approved for marketing?

Mr CLAYTON BARR: Yes, I am.

**Mr BATTYE:** It is a huge undertaking. You are probably best to speak to the Therapeutic Goods Administration [TGA], but the TGA has a lot of resources, which include pre-marketing and post-marketing surveillance worldwide. They depend upon not only the information provided by the sponsors of the product, who must provide a lot of research and generally clinical trials as well in support of their application, but information coming from external sources as well. They go through a very involved process. I have never been involved in that process, it is a matter for the TGA; but my understanding is that it can take multinational drug companies millions of dollars to put that information together, and all associated costs with clinical trials and so on, and then eventually a decision is made by the Therapeutic Goods Administration.

**Mr CLAYTON BARR:** In layman terms, we have probably all taken medications at different times which recommend that you not operate heavy machinery or drive and to be aware of drowsiness—just general things basically acknowledging that the medicine is going to have an effect on your mental capacity and mental abilities. I guess in some way, shape or form, those things must be testable and determinable.

**Mr BATTYE:** The TGA itself does not test that. They rely on the information and resources of the sponsor, and those companies, as you are aware—especially multinational companies—have vast resources and a lot of research goes into it. They are looking at multiple scores of papers, scientific papers, and clinical trials as well before they get to that point. Also with the TGA, of course, a lot of the drugs that they are approving, even though they act independently, the companies involved have already been through a similar process in overseas countries, the United States Food and Drug Administration [FDA] and so on.

Mr McGRATH: You can, in broad terms, describe the effects of a given medication. The issue would be quantifying it for the purpose of being able to set a threshold to make a determination about whether you need to intervene. There are many substances that cause similar effects in the central nervous system—alcohol, for instance. Being able to quantify it would be difficult—and Mr Battye can correct me if I am wrong—because the impacts of a dose administration can vary on the basis of how much you have had to eat or how much sleep you have had. The sort of substance that most of us can relate to in terms of community experience is alcohol, and the impact of a given dose administration of a single drink can vary widely depending on how stressed you are, how your central nervous system is operating, et cetera, and it is not dissimilar with other medications.

**Mr BRYAN DOYLE:** In relation to mental health, have you seen any adverse impacts of synthetic drugs?

**Mr McGRATH:** We would not necessarily quantify it for the purpose of providing treatment intervention, but it would be fair to say that, given the evidence around the binding of receptor sites, we would anticipate that the same negative consequences in terms of predisposition towards psychotic episodes would come with these medications. We would be more interested, though, in resolving the psychotic episode and obviously dealing with preventing somebody from taking any form of cannabis, no matter what the source, as a method of preventing any further psychotic episodes. So I cannot give you any data, but it would be fair to say that we would expect that the more that this particular substance was used the greater the likelihood of further psychotic episodes in those who are predisposed.

**Mr BRYAN DOYLE**: In your role, would you harbour a concern about the proliferation of these synthetic drugs in the community?

**Mr McGRATH:** In the mental health space, where we have no particular enthusiasm for using cannabinoid substances of any type, obviously any substance that is likely to exacerbate an underlying psychotic illness is something we would not want to see proliferate.

**Ms SONIA HORNERY:** We hear in media reports that ice is highly addictive. Why is that, as opposed to other drugs that we hear about?

Mr McGRATH: There are two reasons, I guess. One is that, compared to other forms of amphetamines, it similarly has a relatively short half-life and therefore has repeated dose administrations. The second reason is that it is generally used intravenously and so, as distinct from other forms of amphetamines that frequently are administered nasally, intravenous use means that it gets into the bloodstream and to the brain quicker than amphetamines introduced nasally or orally. That is the case with all medications: intravenous administration will get them to the brain quicker, and therefore the substance has a bigger impact and causes greater changes to neural pathways and plasticity in the brain. That is the primary reason. It is a more concentrated form of amphetamine as well. On a chemical composition basis, it is not substantially different from other forms of amphetamines, but it is in a more concentrated form.

Mr CLAYTON BARR: Does NSW Health have any role to play in terms of educational awareness?

**Mr McGRATH:** I think it would be fair to say that NSW Health would not be encouraging any form of cannabis use, irrespective of the source. So it would be a consistent part of our frameworks to be making reference to reducing cannabis use across the board.

**Mr CLAYTON BARR:** Does NSW Health specifically develop any healthy lifestyle advertising campaigns, or any teaching materials to go out to schools or education centres, or anything like that?

Mr McGRATH: You have to be careful with the way you undertake education messages with different forms of drugs. There are different types of messages for different types of drugs, given the target cohort and the group you are trying to encourage, and the legal or illegal nature of the drug. You would note that we do a number of campaigns in the alcohol space targeted at a licit substance and a particular behaviour change that is anticipated. You would not run a similar campaign for an illicit drug like cocaine or amphetamines. It is important for us to be providing appropriate messages to appropriate groups that might be interested in or curious about the use of a given substance; so, as I said earlier, we would be involved in providing anti-cannabis use messages to any cohort that might be a target cohort for us.

**CHAIR:** Would you see the specific synthetic drug category as worthy of an awareness program run simply on synthetic drugs, given the rise in their use and the fact that that they are currently available to the public?

**Mr McGRATH:** We have given this consideration. My concern is de facto marketing by bringing the substance to the attention of those people who are currently unaware that this substance exists. So you need to be really careful because there are in the community a broad range of different target markets. The population is very broad. And even within those who might be at risk of deciding to make a poor choice in terms of using a substance, they are not an homogenous group either. So it is important to know exactly what you intend to achieve by targeting a particular group with a given outcome. Given that usage rates for cannabis across the community have dropped substantially in the past 10 years, particularly in our target cohorts, at this stage I would be guarded about strongly promoting a message that this substance is available for that particular cohort.

**CHAIR:** Just going back to the Drug Misuse and Trafficking Act, schedules 1 to 8 of the Standard for the Uniform Scheduling of Medicines and Poisons are incorporated in the Drug Misuse and Trafficking Act, but schedule 9 is not. Superintendent Bingham said he believed schedule 9 should be included in that Act. What are your views on that?

**Mr BATTYE:** If I could clarify that: Schedules 1 to 8 are adopted by reference into the New South Wales poisons list, not the Drug Misuse and Trafficking Act. Schedule 9, as far as New South Wales is concerned, legally does not exist. We do not do anything with schedule 9. As at 1 May this year, seven chemical groups have been put into the Standard for the Uniform Scheduling of Medicines and Poisons, one being the cannabis medical group. But that has no effect unless either the individual substances are adopted into schedule 1 of the Drug Issues and Trafficking Act; or unless, and it would be a big project, we went down the track of somehow adopting schedule 9 by reference into schedule 1 of the Drug Misuse and Trafficking Act.

**CHAIR:** Do you believe that is something we should do?

**Mr BATTYE:** It is outside Health; it is a matter for Attorney General and Justice, and probably with Police. I know that there are other jurisdictions which do adopt it by reference, and I know that there are other jurisdictions that take schedule 9 entries and put them into their legislation. In New South Wales, I think the issue is it would be a big volume of work, because unlike the poisons list where we adopt the substances in the Drug Misuse and Trafficking Act we also have to look at the quantities, trafficable quantity, et cetera, and that involves a fair bit of work.

Mr STEPHEN BROMHEAD: We have heard evidence that these synthetic products include cannabis, cocaine, amphetamines and ecstasy, and others. You have told us about the regime and what national and international companies have to go through to bring a medicinal product onto the market. However, these products are being sold—unregulated, and without testing—to anyone. What are your feelings and thoughts on that?

**Mr BATTYE:** It is like chalk and cheese really. There is no correlation. The regulatory regime for legitimate medicines is very extensive; it costs a lot of money to operate at all levels, and it is there to protect the public. The drugs to which you refer are there for the sole purpose of making money for the entrepreneurs. I do not know of any way in which their safety can be guaranteed in any way to the public. We are talking about two different things; it is almost like two different planets when we are talking about the regulatory regime for medicines as against these substances. For example, they can be easily contaminated. Who would know? We know that when legitimate medicines are made a very strict quality assurance program goes into place. I do not think anyone is proposing that there be quality assurance in relation to these substances.

**Mr STEPHEN BROMHEAD:** New Zealand has introduced or is about to introduce a regulatory regime. The first part of it is that all products are prohibited. Then the applicant has to go through a certified laboratory to prove that the product is safe before it can then go onto the market. Are you aware of what is proposed in New Zealand?

**Mr BATTYE:** I have only read what the proposal is; I have no detail of it.

**Mr STEPHEN BROMHEAD:** Without knowing what they are doing, do you think that proposal does not go far enough, and that the analysis of the products would have to be far more rigorous? And if we went down that road, do you think our proposal should be at least comparable to what happens before a legitimate medicine goes onto the market?

**Mr BATTYE:** From my personal point of view, I would think, for the protection of the public, it should go down the same route if we are looking at a legal regime of having these substances legalised for sale.

**Mr STEPHEN BROMHEAD:** If I could go back one step. With your experience, do you think we should go down the path of prohibition only, or should we look at regulation?

**Mr BATTYE:** I do not think I could give an opinion on that.

Mr STEPHEN BROMHEAD: What do you think, David?

Mr McGRATH: I will not give an answer either, for a couple of reasons: one, I am not familiar with the New Zealand approach that generated the start of the question; and, two, in relation to imposing any thresholds if you prohibit something and then at a later date make it available to the market, you would need to be consistent with your thresholds. I guess I would point out that you would have difficulty saying that things like tobacco and alcohol do not pose dangers and difficulties for people, and they are currently licit substances. So you would want to be careful that you do not create adverse outcomes as a result of the particular regulatory mechanism that you put in place. Obviously, that is a matter for government, but I just point out that both of those substances are carcinogens.

**CHAIR:** Given the concerns you raised in terms of the uncertainty about what is in these products that are being sold to the public, would you be of the view that the current situation in New South Wales is not working and that an approach similar to that taken in New Zealand would be a better approach for the health of New South Wales residents?

**Mr BATTYE:** I think the reason it is not working in New South Wales, to start with, is that we do not have any regulation at all regarding these substances—other than the seven specified substances which, if it can be proven, would be in the position of being illegal supply. Otherwise, we do not have any regulation right now in New South Wales.

**Mr McGRATH:** My comment would be that these particular substances are problematic, and we need to improve our capacity to prevent the uptake and use of these substances. I cannot comment on the regulatory system; I am not familiar with the detail of the New Zealand model. Obviously, Mr Battye is a bit more familiar with it than I am. Nonetheless, I think your point is well made.

Mr CLAYTON BARR: The World Health Organization definition of a drug is a substance which when put into or onto the body changes the way the body works, or something thereabouts. If we think about the current context of drugs in our community, obviously we have medicines but we also have some recreational-style drugs like caffeine, tobacco and alcohol. It strikes me that this is a new layer of drugs coming into our community that do not quite fit the medical definition of what a drug is. Given that they are new, is it appropriate to allow them into the category of recreational use along with caffeine, tobacco and alcohol? I think this would be the first broadstream drug coming online, because with tobacco and alcohol we have a history that predates much care and concern in terms of legislation. Should we be looking at a new use stream like this, or future use streams, as coming through more of a medical consideration and determination? Because testing regimes are so important because of the potential consequences—indeed, alcohol and tobacco are two examples that the consequences can be significant—should all new drugs come through health and medical testing regimes?

Mr McGRATH: I think it is important to look at whether something is being marketed as pharmaceutical or not being marketed as pharmaceutical. I do not think these particular drugs are being marketed as pharmaceuticals. And, as I said before, you risk capturing a whole range of other substances in this particular framework unless you set your thresholds for what is in scope and what is not in scope. It is difficult to disagree with your argument if you are looking at pharmaceuticals, absolutely. I mean, that is a clearly logical position to take with pharmaceuticals. I think Mr Battye has agreed that that would be the appropriate threshold to set. The difficulty you get is when something is not being marketed as a pharmaceutical and you start moving into products that are outside of that remit. As I say, you need to be really clear on what the threshold is and what is in scope and what is not in scope or you could have some perverse outcomes. Nonetheless, the threshold for what is at risk for the community here, and what is at risk for individuals who use these particular substances, are reasonable concerns, and it is reasonable that this Committee takes that into account in the outcomes of its deliberations.

Mr BRYAN DOYLE: So if you market a drug that has some psychotropic qualities, is that pharmaceutical or not?

**Mr McGRATH:** I would ask Mr Battye to comment on the specifics of the legislation, but I doubt that it is being marketed as a pharmaceutical for the purposes of a given health outcome.

**Mr BATTYE:** I would have thought that pharmaceuticals are developed to assist people's health. That is the premise that we have pharmaceuticals at all. I have heard it said that drugs which have been used for many years—kinds of things like aspirin—are actually listed products by the TGA on the Australian Register of Therapeutic Goods [ARTG]. If they were brought in today as a new medicine, a drug like aspirin may have

difficulty being accepted as a legitimate medicine to go on the ARTG because of the adverse effects that are inherent in aspirin. It is there because it is grandfathered.

**Mr McGRATH:** I think also products like Red Bull, V, those sorts of things, are also similarly marketing a psychotropic effect but I do not necessarily think they would be marketing themselves as pharmaceuticals.

Ms SONIA HORNERY: What is a psychotropic effect?

**Mr McGRATH:** It is a substance that is designed to have an impact on your brain functioning and your brain chemistry and therefore your perceptions, experiences and those functions that are associated with your brain use. It is generally associated with the illicit substances most people use in that framework, but the usage is quite correct: any change to your brain chemistry sits within a psychotropic substance.

**CHAIR:** Thank you very much for coming today. We held our first public hearing last week and we will be continuing after lunch today. After that there may be some further questions that the Committee may have and we might write to you in respect of those issues. If you respond to those issues they will form part of the evidence you have given today. Are you happy if the Committee writes to you if any issues arise?

Mr McGRATH: Yes.

Mr BATTYE: Yes.

(The witnesses withdrew)

(Luncheon adjournment)

**MONICA JANE BARRATT**, Research Fellow, National Drug Research Institute, 54-62 Gertrude Street, Fitzroy, Victoria, affirmed and examined:

**CHAIR:** I welcome Dr Monica Barratt, Research Fellow with the National Drug Research Institute. Thank you for appearing before the Legal Affairs Committee today. Before we proceed, do you have any questions concerning the procedural information sent to you in relation to witnesses and the hearing process?

Dr BARRATT: No.

**CHAIR:** Would you like to make an opening statement before the commencement of questions?

**Dr BARRATT:** I would. Firstly I would like to thank the Committee for initiating this inquiry and for inviting me here today. Just a little bit about the institute, myself and my research, and I will try and keep it relatively brief. Our institute conducts and disseminates research that contributes to the primary prevention of drug-related harms in Australia. We are especially interested in understanding how the legislative fiscal regulatory and educational interventions affect drug-related harms and, of course, how we might use these interventions to reduce overall drug-related harm. It is probably worth noting at this point that we consider caffeine, alcohol and tobacco to be drugs as well as currently prohibited drugs, prescription medications with psychoactive effects and the so-called legal highs or new synthetic drugs that we are talking about today.

The institute has been operating for over 25 years. It was founded in 1986. Our head is in Perth but I am from the Melbourne office. We are one of the three federally supported centres by the Department of Health and Ageing. I have been working at the institute since 2002. I studied psychology and sociology and addiction studies at university. I recently completed my PhD and am now currently employed with the institute as a research fellow on a two-year fellowship through the Department of Health and Ageing.

I think it is important at this point to acknowledge that I approach my work from a particular framework or philosophical approach. My research is premised on the normality of the human desire to explore altered conscious states, whether that is through the use of psychoactive substances or through other activities like meditation, yoga, extreme sports, et cetera. I think we all understand the desire for altered conscious states—whether it is to relax after work with a drink or to have a coffee in the morning to wake ourselves up. I think if we accept the normality of the desire for altered conscious states we can work together to construct a policy environment that is conducive to reducing health and social harms that can arise from the exploration of these by many people across Australia and, indeed, across the world.

So in this framework I have two core research interests. The first is concerned with understanding the impacts of legislation and legislative change in the context within which people use drugs. Secondly, my work explores how psychoactive drugs are used within an internet-saturated society; so I am interested in digital technologies as well. One area where these interests intersect is in trying to understand how we should best respond to newer synthetic drugs, which also have a relationship to the internet too. Last year our team conducted an online survey of Australians who reported the use of synthetic cannabis products. I understand that you have all had a look at the paper that we have just published and you may have seen my online video presentations of the same. The published paper described the demographic profile, the use patterns, the market characteristics, the reasons for first use and self-reported harms associated with synthetic cannabis products in Australia.

There are three points I would like to draw from this study that I think are important for the Committee to consider. The first is that the legality of synthetic cannabis products appears to be a really important reason for their first use. These results indicate that there is a demand for a legal cannabis-like product, certainly amongst the people who completed the survey. Secondly, almost all synthetic cannabis users in this study were already cannabis users. We did not find evidence that there were lots of people who had never used illicit drugs that suddenly began to use synthetic cannabis. Thirdly, evidence from this study and the wider literature point towards synthetic cannabis products being more harmful than cannabis itself, both due to the lack of information on ingredients within these products and the pharmacological profile of some of the synthetic cannabinoids. I am sure you have heard a lot about that in this hearing.

I think those three points are important because they show that we cannot understand the problem of synthetic cannabinoids nor craft a legislative solution without considering the wider context of cannabis prohibition. There is a global debate taking place at this time where many nations are reconsidering whether

there are more effective ways of regulating cannabis rather than its current prohibition, and while I understand this is not the topic for today I think one way that we can interpret the research that we have just done is that cannabis prohibition has had this unintended effect of actually stimulating demand for a synthetic cannabis product as a substitute for cannabis. Unfortunately, this effect may result in greater harms amongst those people who switch from cannabis to synthetic cannabis. This is not to say that cannabis is harmless. There are very many known risks from its use, but we also have a wealth of information about cannabis harms as well as its medicinal potential. We know much less about synthetic cannabinoids, especially since as one set is prohibited a new set comes out; so it is a much lesser known set of unknowns.

I have also got a little bit of additional analysis that I did, which I can talk through if you like, and I am happy to take any questions on the paper itself. The additional analysis, I can just tell you briefly about that if you like. There is another paper that is still in preparation from the rest of the data that we took. We asked the Australians who reported use of synthetic cannabis about their perceptions of the legal status of synthetic cannabinoids when they first used it and then when they were currently completing the survey. With first use, 84 per cent of them had used the drug before mid-2011, which was when it was first made illegal by Western Australia and then onwards. Most of them had tried it when it was actually legal and, indeed, 73 per cent thought it was legal at the time; 24 per cent thought that only some synthetic cannabinoids were legal and others not; and a small 3 per cent thought that they were illegal.

However, come the time of the survey in December 2011-January 2012, we asked the same question: Do you think it is currently legal? What is the status currently? We found that things had changed: 7 per cent thought that all of them were legal at that point; 67 per cent thought that some were legal and some were not—and they would have been right at that point; and 26 per cent thought they were all illegal. So things changed a lot in that six months and there were certainly changes in perception.

We also asked the group what they thought should happen in terms of how to regulate the synthetic cannabinoids moving forward. We gave them four options: Should it be illegal, decriminalised, regulated or legal? An overwhelming majority thought it should be regulated; we had 7 per cent who thought they should be illegal, like currently prohibited drugs, we said; 5 per cent thought it should be decriminalised—we gave the example like cannabis is in some States; 79 per cent thought it should be regulated like alcohol and tobacco; and 9 per cent thought it should be legal with no regulations. We then asked those 79 per cent what they thought the regulation should be and 97 per cent said that they thought it should be available only for adult use; 86 per cent said there should be an enforcement of accurate labelling; 80 per cent said there should be an enforced standard of purity; 78 per cent said there should be provision of health and harm information; and 74 per cent said it should be available only from restricted outlets.

We had, basically, the whole sample of people, and not all of these people continued on with their synthetic cannabis use; many of them tried it, it was not something they liked and they went on to other things, and they completed the survey also. I thought it would be worth putting into the mix 300 Australians' thoughts on how these drugs should be regulated into the future.

**CHAIR:** A lot of your research has predominantly been around synthetic cannabinoids. How would you define "synthetic drugs" and what types of products would they encompass? Stemming from that, in terms of the other products like synthetic amphetamines and the like, how prevalent do you see them in society and have you done any research into those substances?

**Dr BARRATT:** We have not done any formal research into the prevalence of other synthetic drug use in Australia, so I do not have that kind of information. Anecdotally I have colleagues who go to some of the adult stores locally and they see some of these products there; so anecdotally they do exist. As to how prevalent their use is, I cannot answer that question. Indeed, even with synthetic cannabinoids this study is the first survey of users in Australia but it does not give us that information: What is the prevalence amongst a particular group. Because this is just who used them as opposed to a larger, say, household survey where we could ask the question: How many people have used them?

It is really an area where we do not have a lot of information about prevalence. We do have a little bit from the ecstasy and related drugs reporting system from the National Drug and Alcohol Research Centre; but that is just for a subgroup of ecstasy users, and they have been tracking over the last couple of years the prevalence amongst ecstasy users of the use of synthetic new drugs. As to the definition, I think it is problematic because, for me, any drug that is derived from a plant usually has undergone some kind of synthesis. So when you start to get technical about what is a synthetic drug you can include almost every drug there because really

even with something like cannabis it may go through a process. We tend to think, obviously, about cannabis as a plant drug, heroin as a plant drug, cocaine as a plant drug. But going on from there are some of the prohibited drugs—MDMA, amphetamines, et cetera—that are synthetically produced, so they are synthetic drugs too. But I understand, at least in this inquiry, we are looking only at the ones that are not on the list of prohibited drugs.

Then we move to the newer synthetic drugs, and that is what I have been quite interested in: What are these emerging substances that are coming up into the marketplace—often coming up quite quickly and then they might be legislated against and another one pops up. I am more interested in that set, which I think is where the inquiry is locating itself.

**Mr CLAYTON BARR:** I just want to clarify something in my own head. The sample of 300-odd Australians, they are people who are currently cannabis users?

**Dr BARRATT:** Three hundred and sixteen had reported that they had ever used synthetic cannabis; 96 per cent of them—almost all of them—said that they had also used cannabis. So we had something of the nature of 12 people who said, "No, I have never used cannabis but I have used synthetic cannabis". It was a very small number, but there were, indeed, a few people who had not used cannabis, if that makes sense.

**Mr CLAYTON BARR:** Sure. I just wanted to clarify that, because in terms of the statistics about thoughts on whether or not it should be legalised—

**Dr BARRATT:** We are talking about the views of drug users, yes.

**Mr CLAYTON BARR:** You have talked about harm a couple of times already today. In fact, in your opening remarks I think you said that synthetics could cause greater harm than cannabis. What research or background is there about harms and the types of harm and the levels of harm with synthetics—in particular synthetic cannabinoids?

Ms BARRATT: In preparation for this paper I conducted a literature review and tried to get my head around that very question of what are the known harms of synthetic cannabinoids, and one of the things that came up was problems with heart—tachycardia, irregular or fast heartbeat was something that came up. Many of the harms that we asked about in the survey were based on harms that we thought might be likely. Disassociation, paranoia and psychosis are all related to the problem of psychosis and the potential for these drugs to cause that.

We expected that that would be the case because there has been some literature across the world that people have ended up in a psychotic state. There is some literature from the US and from New Zealand as well. The issue with a lot of this literature is that it is often case studies that are brought forward into the literature: someone from an emergency department reports that there were three people that they saw. It is going to be very much the extreme end of what is going on.

What we have done here is we have asked for a community sample rather than a sample of who is already in treatment and already at the emergency department, which is what we do not tend to see in the literature. We tend to see the hard end: what has gone wrong. It is important to see that; that is usually the most important thing to see. But that means that we do not see what does not go wrong. In this case study there is a proportion of people who claim they have not experienced harms. It is self-report. Maybe they have experienced harms that they are not aware of. That is possible. It is possible and also likely with all the drugs that we look at that we tend to see the most harmful. That is what comes to our attention through all of the systems—the hospital system, the legal system.

But when things are going okay, that is when it is underground because people are not going to come forward and say, "I am using this drug and, actually, it is perfectly fine for me." That may be problematic for them, especially if it is stigmatised or illicit behaviour that they are talking about. That is why we have to temper some of this and realise that some people are going to experience greater harms. This is a problem because how do we know who those people are going to be. Tachycardia is an example. If you have a pre-existing heart problem and you were to smoke synthetic cannabis, you may be at more risk of having a heart attack, if that is one of the problems. Pre-existing conditions is an issue we have to think about.

To answer the question, the problem with this is that we do not tend to know what is actually in these products. That is really what makes this hard. With this information, people have self-reported that they took

synthetic cannabis. Firstly, did they take synthetic cannabis? Maybe they took a herbal blend that said it would be like cannabis, so we do not know that. Then we do not know which synthetic cannabinoids were in it, we do not know how much of each were in it or what combination. They have experienced harms, but we cannot pin it down easily with this data to an individual chemical like JWH-018 with this information.

**Mr CLAYTON BARR:** You referred to a literature review about harms. In terms of similar studies to the one that you have done, is there anything by way of similar studies to the work that you have done here?

**Dr BARRATT:** There has been one previously published survey of synthetic cannabis users in the community and that was the Vandrey study. Yes, they asked some similar things that we did. In fact, we modelled some of our questions on their questions.

Mr CLAYTON BARR: Will you clarify the study again?

**Dr BARRATT:** Yes, Vandrey, V-A-N-D-R-E-Y, the first author I cite in this paper, if you want to look at that. There is also another paper that I am a co-author on, which is currently under review. That has not been accepted yet. That is actually a much larger sample of nearly 1,000 synthetic cannabis users. In that paper, we explore more of the harms from a community sample. There is more to come out. This literature is highly evolving. I have an alert where synthetic cannabis pops up and every week there are new papers. There is definitely new work happening at the moment.

**Mr CLAYTON BARR:** Based on the response from the participants in your study and what they thought—should it be available, should it be restricted—it sounds like they would accept and expect a fair bit of regulation around the possible availability?

**Dr BARRATT:** Yes, absolutely. That is why I thought it was important to bring that to this hearing today, to note that only a very small number of them thought that this material should be freely available. It was really not what they thought. They thought it needed regulation and it needed control. A couple of weeks ago when I spoke on ABC Hack, a number of young people called in who had used this drug. Many of them said that they felt there needed to be more control. The fact that it was, in many cases, still available from a local outlet was a problem for them.

**CHAIR:** In your opening remarks you touched on the legality side of it, given that the majority of users, in fact almost all of them, were actual cannabis users.

**Dr BARRATT:** That is right.

**CHAIR:** Will you elaborate on that a bit more, in terms of the approach that you believe they were looking for a legal alternative?

**Dr BARRATT:** This is interesting because one might assume that if you are already using an illicit drug that you are not going to care if another substance is legal. There is actually a toll that is taken by the person who is using an illicit substance over many years around stigma, around the concern that perhaps at any point they might end up with a criminal conviction, or there is a fear amongst some of these people—not all—that they cannot come out and say who they are and what they are doing. Whereas if a drug is regulated, is available, is not prohibited, is not criminally sanctionable and actually does what they want it to do then it seems to be preferable. I was not entirely sure that legality would be an important reason for first use. Legality was the second-most important reason after curiosity. I coded these textual responses.

We asked that question, "Why did you first use synthetic cannabis?" as a textual response, so people have written responses. I then coded them. Their curiosity was, "I am curious to see if this legal drug really is like cannabis." Some people found that they did not want to continue to use synthetic cannabis. It was that they all thought this is definitely a substitute. It seemed to be an idea, "Well, it is advertised as a substitute. Is it really a good substitute or is it a bad drug? Do I want to use this drug?" People were curious in that sense, but also curious to see whether it could be something that they could substitute entirely, and, therefore, perhaps come outside of this context that people end up in, which is that they have to hide who they are and what they are doing from everyone around them.

**CHAIR:** Was there any finding that any participant in the survey had substituted their prohibited drug use to a synthetic drug use?

**Dr BARRATT:** There were some who had done that. I did not speak directly to these people. Some of them wrote comments, which I have not analysed, at the end of the survey to tell me a little bit about their stories. I do remember some of them said, "I have completely substituted." This is not necessarily a good thing. This is a real concern. If somebody was a daily cannabis user and they substituted for daily synthetic cannabis, who knows what is in that product? Who knows whether that will precipitate harms that were not there before? Who knows exactly what is going to happen with that situation? Anecdotally, I have heard of some very bad things happening in that kind of situation. A couple of weeks ago someone contacted me to say that one of their friends was in hospital because they did exactly that: they switched. I do not know why they switched, but they did and they ended up in hospital because clearly whatever was in this "legal" alternative did not agree with them.

**CHAIR:** In the paper you say that one of the limitations—which you touched on—was predominantly that almost all of the participants had had some drug use, or were currently using prohibited substances. First, why do you think that was the case? Secondly, from the small amount of participants who had no history of prohibited drug use, what was their motivation for taking a synthetic drug in the first place?

**Dr BARRATT:** Thanks for that question. The limitations are important. I will answer the last bit first. Because there are only such a small number of people who had not used another prohibited substance, I did not feel it was appropriate to start analysing only that group, and I was very curious about that group, but with ten or so it is not reliable. I cannot really answer that from the data. I expected that there would be a group. The limitations are important. I touched on this in the paper. Maybe the reason we ended up with 96 per cent of cannabis users was because of the sampling. Maybe it was because of the places that we advertised the survey. The survey is not a representative sample. It is not a household survey where everybody had a chance of being included. It was a survey where we advertised on websites.

We did a little bit of mainstream media but, really, it was a convenience sample of people who decided to participate. As a result, it may be that we have not reached that portion of the population. We do not know that. That is why it is useful to interpret these surveys alongside other information. In this case, because it is one of the first pieces of information we have, that is difficult. We will only know in the next six to 12 months if there is more information that comes out, or more research that can shed more light on it. If there was another piece of research that shows that there is in fact a group that we missed, that is a possibility, and that is something that is a limitation of the survey.

**CHAIR:** It would be a significant research that could be undertaken in terms of that group of people who are using these products without having any history of drug use.

**Dr BARRATT:** If they exist, yes.

**CHAIR:** You are talking about two separately different categories of people.

**Dr BARRATT:** Again, although this is anecdotal, some of the radio shows like Hack and others, when people have rung up, invariably they start the conversation with, "I am a pot smoker and then I tried this." Maybe they are out there. I have not had any contact with them. We found a very small amount of them in the survey, but I think it is still an unknown. It is an important unknown. Policy-wise, if there is a group of people who are being encouraged to use newer synthetic drugs who would not normally do so, then that is a concern.

**CHAIR:** It is certainly the case that if there is such a high proportion using prohibited substances that one of their main motivations for trying synthetic drugs is based on their legality. I would have thought that that would be an even higher percentage for those who have never had a prohibited drug in their life

**Dr BARRATT:** I say not necessarily, because for people who have never gone down that road, and that is the majority of Australians, then there are very good reasons for that that are beyond legality. I am not of the opinion that if we suddenly made everything freely available everyone would partake of it. People have different relationships with altered conscious states and they have different ways of approaching this. We all know different people who approach this in different ways. I do not know to what extent prohibition is dampening desires amongst others who do not partake, if that makes sense. It is a question. It is certainly not known.

**Mr CLAYTON BARR:** I was going to ask a similar type of question. We started that conversation with people already using illegal substances. I want to roll that back and come away from that. My question is does it work the other way? If these things are legal, is there a fear or a concern or data that show people will start here when they otherwise would not have started with an illegal substance?

**Dr BARRATT:** It is obviously not something we can draw from the survey that I am talking about, given that we focused specifically on people who had used synthetic cannabis. It is a concern. I do not have the information in front of me to answer that categorically. I do not know if it can be answered categorically. It is important to ask the question and to do more work on it.

**Mr CLAYTON BARR:** Dr Barratt, one thing I want to clarify about your study, it is 18-year-olds to 25-year-olds; is that right?

**Dr BARRATT:** No. Age is just worth looking at. We had a median age of 27 years, so 50 per cent were younger than 27 and 50 per cent were older. But what was interesting was that 25 per cent were over 34. This study was a bit different to many of the published studies, which show that synthetic cannabis was being used solely by young people. In this case certainly half of the sample was either in their teens or twenties, but we definitely had people who are much older, up into their sixties, who completed the survey. What we did find was we did an analysis of the harms, as you mentioned before, and simply counting the number of harms that people reported and figuring that if they reported more harms, then there was a more severe problem with their use.

We found that the 18 to 25 year olds reported a greater number of harms than the 26-plus cohort. We cannot say that young people are somehow predispositioned to have more harms, but that was sort of what we found. Also people who concurrently use synthetic cannabis with alcohol were more likely to report greater harms, and also if they used a water pipe or bong with the synthetic cannabis, they were more likely to report more harms.

**Mr CLAYTON BARR:** Because of ethics or because of applicants, you would be or you have been unable to study under-18s?

**Dr BARRATT:** It is because of ethics, yes. That was actually a requirement: people had to say they were 18 or over to complete the survey for ethical reasons. So I cannot comment, unfortunately, on the adolescent use of synthetic cannabis.

Mr CLAYTON BARR: Is there any research or background, paperwork, figures or statistics on that?

**Dr BARRATT:** There are some case studies. I do not think there are any Australian case studies, but from the United States there are case studies of teens who have arrived in emergency departments and have had trouble. There are the case studies, but there are also the calls to poisons centres. In the United States, they have actually looked at a whole year's worth of data of calls to their poisons centres for any synthetic cannabis product. They have been able to show the age, the gender and what were the symptoms. That information is good because it is over hundreds and hundreds, whereas many of the case studies are only three or four so it is sort of hard to know. That study is by Hoyte et al. That would be worth looking at, I think—just that one paper on the calls to poisons centres.

**Mr CLAYTON BARR:** To go back to one of your findings or one of the suggestions from your participants that it is reasonable to restrict sale to over-18s, that is it is reasonable to people who are over-18 already.

Dr BARRATT: Yes, it was.

**Mr CLAYTON BARR:** I am not sure if 15- and 14-year-olds would feel the same.

Dr BARRATT: They might feel differently, yes.

**Mr CLAYTON BARR:** I am trying to figure out in my head whether or not those young people have been questioned. Could I even ask you about your participation in the radio show Hack?

**Dr BARRATT:** Sure, no problems.

**Mr CLAYTON BARR:** In terms of phone back and call back into that show, were there any guys calling in saying, "I'm 14", "I'm 17", "I'm 16"?

**Dr BARRATT:** Not that I recall. There were some calls from people working in the mining industry who talked about the drug testing being an important factor. There was also a call from someone who had bought it at a tattoo parlour, which was news to me.

### Mr CLAYTON BARR: Sure.

**Dr BARRATT:** Almost all of them were male. That was something I noticed. Even in this study, certainly the vast majority were male. That was another factor.

**CHAIR:** I am sorry to return to this point, but would you be interested in doing any research or do you think it would be worthwhile—and, as you have said, this would be difficult research to undertake, given the figures—to conduct further research into those who have a minimal drug history and who are taking these substances?

**Dr BARRATT:** I think it is important, absolutely. I think it is important to do more work with that group or to try to find that group. I would have to have another look, but I have a feeling that the situation that happened in New Zealand over the last decade when they had benzylpiperazine [BZP], which was in a completely different category for a while when it was a sort of synthetic substitute to speed and other drugs, that was legally available for a while. Then they cut that back. Over that time, they did some work on who ended up using that. I think they did have a cohort of people there who would not have otherwise done so. That could be interesting work to look at from the New Zealand experience. I understand that you have spoken with some representatives from New Zealand. I think they have a lot to offer because over the last 10 years they have had some experiences to draw from in this area.

**Mr CLAYTON BARR:** Are there any educational awareness programs that you are familiar with around trying to educate about the potential harms of these things, or just buyer beware, or anything like that, particularly for young people?

**Dr BARRATT:** For the synthetic cannabis?

Mr CLAYTON BARR: For the synthetic cannabinoids, yes.

**Dr BARRATT:** I know that very quickly organisations like the Australian Drug Foundation came up with fact sheets which they put online. I remember they contacted me quite soon after this story broke in 2011 saying, "We need to have a fact sheet. Let's get that online." As to any specific interventions, I am not aware of any. I know there have been educational seminars for workers in the field around this issue. People have been saying, "We need to know more. We need to be able to talk to our clients who are coming in and discussing this fake weed." That has been happening, but as to whether there has been any direct education, I think perhaps there just has not been enough time for that. Really, we are talking about something that has happened in the space of 12 to 18 months, and there may indeed be things happening or on the go that are not yet evaluated or out there.

**Mr CLAYTON BARR:** Would any of your 316 participants use and/or consume these products in the workplace that you know of?

**Dr BARRATT:** We did not ask whether they consumed them in the workplace. We did ask them what industry they worked in. We have not published that information and I would have to have another look at the data to get that out. But again I wonder if that is more to do with our sampling frame. For example, I think we got a total of about 10 from the mining industry out of 316. I imagine that is because we did not have any direct contacts with the mining industry and therefore did not go there and directly recruit, whereas had it been something that we collaborated on with that industry, I think we could have accessed a different group.

We did ask people their perceptions of the detection. I put that in the paper. Most of the sample believes that synthetic cannabinoids were less likely to be detected by workplace drug testing, and that was 76 per cent, and also by drug detection dogs, which was 79 per cent, compared to cannabis. They were aware of

this potential capacity for it not to be detected, but we certainly did not ask them, "Did you use this and then work intoxicated on this drug?" I cannot really comment on that, exactly.

**Mr CLAYTON BARR:** I guess the other would just be familiarity around which workplaces do drug testing. We appreciate that mining does, but so do a lot of others.

**Dr BARRATT:** Yes, a lot of other industries. We also asked a bit about that, and again this is not in front of me right now so I do not have the exact figures. But what was interesting was that there were people working, for example, in the public service who were being drug tested. There were people working in the Police Force. There were people who were working in the transport industry and quite a few industries. On the other hand, we had a lot of people working in industries where there was very little drug testing. We had information technology [IT] professionals, media and communication professionals and entertainers and that sort of field where there was very little drug testing.

**Mr CLAYTON BARR:** Is it at all possible to pull that data from what you have around occupations that are more likely to be tested?

**Dr BARRATT:** Yes, absolutely. I can do that for you.

**Mr CLAYTON BARR:** Certainly, anecdotally from the mining industry—just anecdotally—some of the miners might be more inclined to go towards the synthetics because they cannot be tested.

Dr BARRATT: Yes.

**Mr CLAYTON BARR:** So the guys still want to get high and still want to have a party, but do not want to fail the drug test on Monday morning because they will get the sack.

**Dr BARRATT:** Absolutely. We only got 8 per cent of people saying the first reason they tried synthetic cannabis was due to non-detection in drug testing, but I think that is probably because we did not have a high amount of drug testing in our sample. From what I understand, that was one of the main reasons why Western Australia was the first State to move on this in 2011. They had the mining companies saying, "This is happening on our sites. We need to do something about it." It is clearly an issue. I understand you have had representatives from this industry speak on it.

I think it is an issue. When I reflect on this, as I mentioned in my opening statement, I think about one of my areas of interest, which is how legislation affects drugs and their context of use. In this sense we have drug testing in workplaces being prosecuted over the last 10 years and increasing. One of the unintended consequences of that is to potentially stimulate demand for substances that are not being tested. That is clearly not what the drug testing legislation was meant to do, but I think it is one of the unfortunate effects of that legislation. Even if someone is not intoxicated on the job and is not impaired on the job, if they were to smoke cannabis on their week off—if they fly in, fly out—they can still lose their job, even though they are not at all impaired on the job.

There is this problem, I think. This is a concern for people who do want to move back to that idea of the normality of changing one's conscious state to relax or to perk up—all of those things. If that is what somebody wants to do on their weekend off, and that is then seen as something they lose their job for, this is a problem. It is a problem because we end up with a law that does something that it is not supposed to do. We have to really think about that and think about how we might make the law a little different so we could shape what is going on, so that it is less harmful rather than more harmful.

**Mr CLAYTON BARR:** By the same token, if only 20 per cent of your recipients worked in a work environment where drug testing takes place, and 8 per cent of them took these drugs specifically to avoid detection, then almost half of those people would be the number participating.

**Dr BARRATT:** That is right. We have not focused on it in this paper—it is much broader—but it is one of the things we could focus on. I am happy to do that and just briefly look at the numbers. Obviously not right now, but I can bring that up and have a look at it.

Mr CLAYTON BARR: I would really appreciate that.

**Dr BARRATT:** Yes, I will look at the workplace issues.

**CHAIR:** I wish to return to an issue we discussed earlier and put a proposition to you. Synthetic drugs are an emerging issue. There is not much research, as you say, in respect of them. Most people, I would think, see that a significant percentage of users of drugs where there is a concern is the use among young people. Interestingly, as you say with your own research, a lot of the participants were over 35 or 34.

**Dr BARRATT:** Twenty-five per cent were over 34. That is a quarter.

**CHAIR:** That is a significant proportion. This goes back to the issue of whether there is research available which would suggest that users may start with a synthetic product and move to the real thing. Based on evidence that you have shown and that this is a new issue that is arising, we may not be at that point yet. Given there are a number of users who are people using prohibited substances, you would think it would be more likely for them to take a synthetic product than someone who has never taken a drug in their lives before. However, if synthetic drugs were to become more prevalent and over time would become potentially more widely accessible, or the public would know more about these products, you could potentially have a significant core of the population who may start out with something that is legal, particularly in circumstances where the products are marketed as a legal alternative, to move from a legal product to potentially an addiction to a prohibited substance down the track. What do you think about that?

**Dr BARRATT:** I think there are a few issues in what you have just said. The way that I think about this is to remember that there are always two options here. When we think about, for example, we have over 90 per cent of Australian adults saying that they have had a drink in the last 12 months, and that is most people, and we have a greater number than that for whom caffeine is part of their lives and people do not even consider that to be a drug, then we have a much smaller number that would indulge in these other substances.

Ultimately, if someone is going to start using something where they have not used it before at all we have to ask: Are they substituting for alcohol or adding it to that? There are people out there that have not used cannabis before. There is a large proportion of the population that have not used any currently prohibited substance but they are drinking alcohol every weekend. We cannot think usage moves from a zero position to the harms at the other end of the scale. We have to think of what the harms are of alcohol and then what are the harms of what people might then do. What I am saying is that it is unusual to have a zero option on one side of the pendulum.

What I would say is we have to understand the harms of all of the different ways of altering our conscious states including the non drug-related way. That would include things such as extreme sports, horse riding or playing football. What are the harms of all of the ways of altering our conscious states and how can we increase the population's access to the least harmful ways of experiencing their lives, of recreating, of entertainment and of altering the conscious state? Can you increase access to enjoying a sporting event and have people do that more often than drinking on the weekends? That is something that needs to be done as well.

**CHAIR:** If you were involved in playing rugby or gridiron at school, is that more likely to lead to potentially participating in a crazy sport like skydiving or an extreme sport, as you term it? You would say that taking a synthetic drug would lead to a greater potential to take a prohibited drug than be involved in extreme sport?

**Dr BARRATT:** It depends on the experience you have had at the start. One of the things we saw in the survey was that not everybody likes synthetic cannabis. A lot of them tried it only once or twice and said, "It is not what I want and it is not a good drug for me." It being available is not necessarily going to mean that people use it or use it a lot or use it harmfully. We need to step back and think about the drug itself. We talk about the pharmacological properties of the drugs and think to ourselves: They cause these harms. But there are so many other factors that shape what the harms are and how severe they are such as the dose—extra important—of the drug, the setting in which it is used, the expectations of the person using the drug, the people that are around them and the legislative and cultural framework that surrounds that episode of use.

A different cultural framework around regulated synthetic drugs with a lot of information and where it was understood that if you took in excess of a certain amount that was a very dangerous thing to do may shape what the harms are. When I say this I am thinking around the New Zealand model where in order to get to the point where you have a regulated synthetic drug that drug would have to have gone through clinical testing and trials. If it did not pass the trials it would not get through the process. If such a drug does exist, then first you

would have to go through that process, and second, there would need to be strong regulations around advertising. Tobacco would be a good model for advertising rather than alcohol, as we see alcohol widely advertised but tobacco is not.

I think we would all agree that the idea of having these substances in the local store is abhorrent to most people. That is not what anyone would suggest. It would be a problem. But there are so many products out there and so many things that we do, such as, driving a car or getting in an aeroplane, that are risky but we mitigate the risks. We do not say we are never going to drive because we might come to harm. We know there is a purpose to driving. As I mentioned in my opening statement there is a purpose to psychoactive substance use. All of us have a desire to alter our conscious states in different ways and this is one route by which it can be done. There are monks that meditate for 10 days and they do it in a very different way, but not everyone wants to meditate. There are people that are substance free, they meditate and they practice yoga, but most of us do involve substances in some way in our lives and historically that is normal and something that humans have done for a millennia. I do not think it is something we could stop as a species. It would be abnormal for us to stop.

**CHAIR:** You touched on the New Zealand approach. Many of the details are not available yet, but overall as a principle do you think the New Zealand model or something similar would be an advisable approach for Australia to adopt?

**Dr BARRATT:** I have thought about the different legislative solutions and made a list. The New Zealand model is one of those. The five options are: first, continue to ban an individual substance as it comes up; second, ban broad categories, which we have seen a little of in the Therapeutic Drug Administration's ruling; third, use other regulatory systems that are currently available such as medicinal or consumer safety systems; fourth, enact a new legislative framework to deal specifically with new synthetic drugs like the New Zealand model; and fifth, the wholesale overhaul of drug prohibition by designing a new legislative framework for all psychoactive substances.

The first, banning individual substances, is clearly not effective and may cause more harm by driving newer and lesser known products onto the market. It is my understanding that the laws surrounding the second option of banning a category of substances in an attempt to capture new products before they are released are ambiguous and less likely to result in a successful prosecution. The lawyers tell me, as I am not a lawyer, that it might be a good idea but to use the law seems to be difficult. The third option to use existing laws was suggested recently in the journal *Addiction* by Hughes and Winstock. They discuss using the medicines framework in the United Kingdom and laws that already exist. There are problems with that. With the New Zealand option the onus of proof is borne by the manufacturer and that is a huge difference.

The idea is that the cost would not be borne by the Government because once you start to heavily regulate everything it is costly and time consuming. If it is possible, the industry that may indeed profit from this needs to, just like the pharmaceutical industry, take responsibility for all associated costs. I think that would be a sensible way forward. However, we do not know what is going to happen with the New Zealand model. We do not know whether manufacturers will pay the costs and go through the system. It is not clear yet. Will it be profitable for them to do so? If you are a corporation you have to make a profit. Is the market big enough for you to do that knowing you cannot aggressively market your product and you need to sell under strict circumstances?

I think it is yet to be seen whether the industry will go down that route. But on paper it seems to me a circuit-breaking legislative response, whereas the other current responses do not seem to break the cycle of the newer drugs coming out to replace the older drugs. That is the issue for me—how do you break that cycle? The fifth option, wholesale overhaul of drug prohibition, is a bigger undertaking and would be on a worldwide scale because Australia has ratified international conventions which mean that we have to do a whole heap of things. It is hard to look at that issue. Even if we do have something like the New Zealand model with synthetic cannabis or other products, we are still going to have the issue of substitution and the wider issues which present themselves with prohibition.

**CHAIR:** The hearing will conclude today but there might be issues that arise. Would you be happy for the Committee to write to you with any further questions and for any responses you give to those questions or the questions you took on notice to form part of your evidence at the hearing?

Dr BARRATT: Yes.

(The witness withdrew)

(Short adjournment)

**PENELOPE MARY MUSGRAVE**, Director, Criminal Law Review, New South Wales Department of Attorney General and Justice, affirmed and examined:

**CHAIR:** Ms Musgrave, do you have any questions concerning the procedural information sent to you in relation to witnesses and the hearing process?

Ms MUSGRAVE: No.

**CHAIR:** In what capacity do you appear before this Committee?

Ms MUSGRAVE: As the Director, Criminal Law Review, Department of Attorney General and Justice.

**CHAIR:** Will you outline to the Committee your understanding of what types of drugs encompass the term "synthetic drug"? How do you seek to define the term "synthetic drug" for the purpose of legislation?

Ms MUSGRAVE: I will answer the first part of that question first. It is probably best to talk about the meaning of the term "synthetic drug" when talking about the types of drugs that fall within it. Essentially it is a term that has been developed to cover two scenarios and our legislation is currently set up to address those two. The first are drugs that are derived by modifying the chemical structure of existing illicit recreational drugs and the other are substances which might be completely different but mimic the attributes of those drugs. Our legislation is currently set up with the analogue provision that covers those that are structurally similar and the regulation power to add to the schedule that covers those that are different and fall outside the analogue provision.

The second part of the question asked how we might seek to define the term "synthetic drug". That is possibly not a question that needs to be addressed. The term "synthetic drug" is not really a critical definition in the Act. We want an Act that is going to capture synthetic drugs but also capture natural drugs that have psychoactive properties. The legislation needs to be capable of accommodating both types. The fact that it is synthetic does not make it a criminal drug; it simply defines a class of drugs with psychoactive properties that are to be illegal under the Act.

**CHAIR:** Is the current legislation in New South Wales working?

**Ms MUSGRAVE:** The current legislation in New South Wales has worked for a long time. I think the speed of response and the certainty as to whether certain drugs fall within the terms of the legislation are the issues that we are all grappling with at the moment. In short, they are the two issues.

**Mr STEPHEN BROMHEAD:** As you say, you are grappling with the response. Is it true to say that at the moment the Drug Misuse and Trafficking Act is not keeping up with what is happening in the community?

Ms MUSGRAVE: I do not think I would completely agree with that statement. The Act is capable of keeping up with it. The difficulty is in identifying whether that drug is an analogue, and testing it to see if that is the case, and if it is not an analogue you have then got the ability to add to the Act by way of regulation. Part of the difficulty is simply the nature of the industry and the fact that this Committee is looking at situations where we are dealing with marketed products where the constituent elements might be quite different sitting underneath it. There is a lack of evidence here and internationally about the effects of those drugs. I keep on using the word "psychoactive" and the analogue provision in New South Wales still retains that term as something that characterises or is the property that makes that substance one that should be subject to criminal legislation. So there are difficulties with the dearth of evidence about the psychoactive property of substances that are coming onto the market. So there are two critical evidentiary issues: the psychoactive element and the constituent chemical make-up.

Mr STEPHEN BROMHEAD: A pharmacist from Pharmaceutical Services of NSW Health appeared before the Committee who said it is hard for him and others to understand the Act. The Superintendent of Police also said it is hard to understand and that in its present form it cannot be enforced because police have to have a reasonable suspicion that the substance contains some of the substances banned under the Act and they do not know what a drug contains until it is analysed; some are analysed and some are not. The Act presents real problems for law enforcement agencies.

Ms MUSGRAVE: The problem you are describing is probably an issue that applies generally across the criminal law where it is always a struggle in a sense that we are making illegal a certain substance and you need to know that that substance falls under the legislation. We are always going to have to be sure that the substance is a prohibited substance. At the moment the onus is on the prosecution to establish that substance falls into the schedules, and I do understand it is a real challenge for Health at the moment as there are so many new substances that are out there. The question is not so much how it is described but who bears the onus of establishing that. In the criminal law at the moment the onus is on the prosecution to establish that that substance is a criminal substance under the Act. Yes, that aspect is a challenge.

There are some aspects of it that are fairly fundamental to the system. When one looks at the analogue provision it is initially quite confronting in that it is in very technical language. But I do not think that is necessarily the issue with the analogue provision. The issue is that the substance has to be taken, tested and analysed and that evidence put before the court.

**Mr STEPHEN BROMHEAD:** Last week the Committee received evidence that there are probably about 10,000 different analogues of cannabis that have not yet hit the radar. The current legislation is always trying to catch up.

**Ms MUSGRAVE:** The beauty of the legislation is that the analogue provision allows those to be caught. You do not have to have each specifically listed because if it is an analogue all 10,000 will be caught.

**CHAIR:** You still have to test those products. In the meantime those products are on shelves and the police, yourself and the public do not know what is actually in those products.

Ms MUSGRAVE: That is correct and until it has been tested we, in fact, do not know if it is an analogue.

**CHAIR:** Should the onus be reversed and the manufacturers should have to prove that these products are safe?

**Ms MUSGRAVE:** Along the lines possibly of the New Zealand suggestion?

CHAIR: Yes.

Ms MUSGRAVE: It is one of the questions that have been put. I would not be in a position to actually indicate a preference for those two systems. I can appreciate completely where New Zealand has come from. I have not had the opportunity to read the entirety of the Law Reform Commission report but I have reviewed the publicly available Cabinet minute that found the recommendations in New Zealand. It is an interesting proposal. I think it is one that is deserving of a lot of attention. Looking at it in a regulatory framework, it is saying if you want to sell this product then the onus is on you to establish that this product is safe to sell. It breaks that nexus with the criminal action to the extent that it is only when you subsequently breach that there is criminal action and the onus would be on the prosecution to establish that the product that is the subject of the charge was the one that they should not have been selling in that way, or whatever. It is a new way of approaching it and, yes, I would say that it is one that is deserving of some attention.

**Mr CLAYTON BARR:** In relation to schedule 9 of the uniform scheduling of medicines, we do not adopt that into schedule 1 of the Drug Misuse and Trafficking Act in New South Wales. Are you aware of the logic or background for that and/or a problem or impediment to that?

**Ms MUSGRAVE:** I am not familiar with the background and I do not have those materials available. What I can tell you is that no other State automatically adopts schedule 9 into their parallel Drug Misuse and Trafficking Act. What they do is adopt it, on occasion, into their Poisons and Therapeutic Goods Act.

Mr CLAYTON BARR: In other States?

**Ms MUSGRAVE:** In other States. The reason why it cannot be automatically adopted into the offence-based legislation is that they all have quantities. So you have to have some independent thought process go into what quantity should attach to a chemical before it is adopted into the schedule. Under the Drugs Misuse and Trafficking Act, each substance that is listed has a quantity that triggers off various offence provisions

under the Act, so that separate process has to be undertaken before it can go into the Drugs Misuse and Trafficking Act.

**CHAIR:** The police who addressed the Committee were of the view that New South Wales should adopt schedule 9 to the relevant poisons Act. What is your view on that, and is there a view in the department that this is something that should be looked at?

**Ms MUSGRAVE:** The question of whether or not it should go into the Poisons Act would be something for Health to respond to because it falls under the health Minister's portfolio. As to whether or not it should be adopted in the Drugs Misuse and Trafficking Act, there are initial discussions happening about what would be required for that to happen, what sort of amounts will apply and what the issues are, but those discussions have not been finalised. I should add that they are only just at departmental level at the moment.

**Mr BRYAN DOYLE:** Drawing on your experience as a prosecutor, you have had extensive Commonwealth and—

Ms MUSGRAVE: Primarily Commonwealth.

**Mr BRYAN DOYLE:** The police have indicated that the problem with the analogue provision is that you need to get it analysed to say that it is analogue and you need further proof from a pharmacologist to say that it has a similar effect, so there are two stages to getting it through. Do you see that as a problem from a prosecutorial perspective?

Ms MUSGRAVE: I can give you an answer from my experience as a Commonwealth prosecutor, which probably is not representative of the Department of Attorney General and Justice's position in this instance. I have had very few matters relying on the analogue provisions, and I have to say it is probably due to the fact that I have Commonwealth rather than State-based experience. Primarily that was related to the importation of drugs, and the rise in non-traditional drugs—apart from heroin and cocaine—was only in the last few years. I can actually say I cannot recall having to lead evidence about the psychoactive effects, but having said that—actually no, the Commonwealth definition is slightly different.

**Mr STEPHEN BROMHEAD:** Are you aware that in Australia we are unable to test for some of these synthetic drugs?

**Ms MUSGRAVE:** That would be a question that the Division of Analytical Laboratories is probably best placed to answer. I would say that that is a challenge across the world.

Mr STEPHEN BROMHEAD: If we cannot test for it, that must be a problem, must it not?

**Ms MUSGRAVE:** I am not quite sure if I am in a position to answer that.

**CHAIR:** Going back to the New Zealand model, which you said is worthy of further consideration, what are the difficulties in New South Wales adopting such a regime? What difficulties do you see in incorporating similar provisions in New South Wales, and what would be your view in terms of making recommendations to the Federal Government in respect of the approach taken in New Zealand?

Ms MUSGRAVE: I do not think that is a question I can answer conclusively today because I think you have probably touched on a fairly complex area. I think the short answer is that it is an aspect that does mean that national consistency in the legislation is desirable. Whether or not that means that the legislation would be implemented by the Commonwealth is one thing. There are other ways of approaching it where there is agreement on a nationally consistent approach to be taken by all the States and Territories and the Commonwealth. Those issues have not been resolved across the States and Territories, but I think there is a willingness to look at them.

**Mr BRYAN DOYLE:** Has the Criminal Law Review Division undertaken any research into the problem of synthetic drugs?

Ms MUSGRAVE: No, we have not taken any independent research into the area. We are working in the area on a number of different fronts. We were responsible for the regulation which added Kronic to the

schedule. We are involved in various State and national forums and departmental discussions about the sorts of issues you have been raising today.

**Mr BRYAN DOYLE:** In relation to the listing of Kronic, could you step us through the process that was required to do that?

**Ms MUSGRAVE:** It happened I think over a year ago now—time does fly. I think it is a fairly good example of how the existing Act can respond fairly quickly. It is not something that is across all pieces of legislation, but this legislation allows the schedule in the Act to be amended by way of regulation. I can get back to you with the time frames on that particular matter, but my recollection is that it was a very quick response. I hesitate to say days but, from memory, if it hit a week, it was not much more than a week. We received a formal request. Once we received a request we could action it very quickly.

**Mr STEPHEN BROMHEAD:** Who did you receive that request from?

**Ms MUSGRAVE:** I cannot recall at the moment. I can get back to you. It would have been a formal request from the Attorney, as he is responsible for that legislation.

**CHAIR:** How certain are you now that there are not products being sold by retailers that have a new set of chemical compounds that are outside the schedule?

**Ms MUSGRAVE:** The regulation can only extend to the chemical compound that we were advised about, that is right, so there are limits to that unless it is an analogue provision.

**CHAIR:** Thank you very much for coming today. I think you have taken a couple of questions on notice. At the conclusion of the hearing, members of the Committee may wish to write further to you in respect of some issues that we see as requiring further information. If you are happy to respond to those, they will form part of your evidence given today.

Ms MUSGRAVE: That is quite all right, yes.

(The witness withdrew)

(Short adjournment)

**PAUL GRAHAM ANTHONY DILLON**, Director, Drug and Alcohol Research and Training Australia, and Communications Manager, National Cannabis Prevention and Information Centre, sworn and examined:

**CHAIR:** I welcome Mr Paul Dillon from Drug and Alcohol Research and Training Australia. I thank you for appearing before the Legal Affairs Committee today to give evidence. Before we proceed, do you have any questions concerning the procedural information sent to you in relation to witnesses and hearing procedure?

Mr DILLON: No.

**CHAIR:** Could you state the capacity in which you are appearing before the Committee?

**Mr DILLON:** I am here representing two organisations realistically. Firstly, regarding the submission of the National Cannabis Prevention and Information Centre, I am the National Communications Manager for that organisation, and I wrote the bulletin that you have. When I spoke to the organising people and I was invited to appear before the Committee, they expressed interest also in the work of my own consultancy company, in which I work particularly with young people and school communities, and what I am seeing in schools around the whole issue of synthetics. So I represent those two areas.

**CHAIR:** Mr Dillon, we will ask you a number of questions, but would you like to make an opening statement about your background and any ideas on which you would like to address the Committee?

**Mr DILLON:** I have been working in drug education for about the last 25 years, and working at the University of New South Wales either at the National Drug and Alcohol Research Centre or the National Cannabis Prevention and Information Centre for about the last 18 of those years. I have seen drugs come and go over that time. I do an awful lot of media; I suppose that is where I am best known. I was the media spokesperson for the National Drug and Alcohol Research Centre for many years, and I continue to work with the media under my own banner of Drug and Alcohol Research and Training Australia.

I have seen legal highs—if that is what you would like to call them, and I am sure that is one of the matters that you will ask me questions about—come and go over many, many years. Some of them come in and then disappear. What is interesting about those is that they normally do not work—and that is usually why they disappear pretty quickly. Drug users go, "They're not very good, I'm not going to use them," and they disappear in a puff. I think what is unique with the new range of synthetics, and most particularly the synthetic cannabinoids, is that they do work, and they work very well. So, unlike other legal highs, these have not gone away quickly. From what we see in Europe—I was in Europe at a big conference at the end of last year—we have a huge wave of them yet to come. This is not the last of them; there will be an awful lot more yet. And demand for them is not going away.

My greatest concern—and I suppose why I am here representing my own company as well as the National Cannabis Prevention and Information Centre is that I can say more under my own company than I can say on behalf of a research institution—is that I think there has to be a better way than just constantly banning something. That is because banning makes it more interesting, and it certainly does not deal with the issue. I think the underlying issue here is: Why are we seeing younger and younger people who want to get off their face at a younger and younger age, and not particularly care about the harms that we talk about? I have done quite a bit of media in the past couple of weeks about the YOLO generation. YOLO is something I had never heard of until earlier this year. After I gave kids a talk about the harms associated with certain things, they put their hand up and said, "Well, why should we care about that? We're the YOLO generation." I said, "What the heck is YOLO?" "It's you only live once," they said. It is very much a social media term seen on Facebook and Twitter. Basically, it is like, "We only live once, so we might as well live it really, really well." I think that sets up lots of challenges for us.

My great passion is young people. I was a teacher 30 years ago, and I have a great passion for making sure that whatever young people do is done when they are as well informed as possible. These synthetics set us great challenges because we do not know anything about them at all. I mean, we have new compounds coming up all the time, and we have people who are doing ridiculous things like putting out warnings about products when we simply do not even know what they are—so how can you put out a warning about them? You can only cry wolf so many times. What absolutely and categorically has happened is that young people simply do not believe us anymore—and, to be quite honest, I do not blame them—because ridiculous people are saying ridiculous things. We can say, "These are risky, we don't know anything about them; you are the guinea pigs of

the future." We can say all of that stuff. But to say it will do this or it will do that, when we do not even know what the compound is, is highly problematic.

**CHAIR:** Can you outline for the Committee your understanding of what types of drugs are encompassed by the term "synthetic drugs"? I appreciate you have done a lot of work with synthetic cannabinoids, but you might discuss other products as well. You might also deal with the challenges that you believe these products pose to society. And how would you seek to define the term "synthetic drugs" for the purposes of legislation?

Mr DILLON: Wow!

**CHAIR:** You might start with your understanding of the types of drugs encompassed by the term "synthetic drugs".

Mr DILLON: I have done a couple of radio interviews based on this hearing, and I think those interviews are to be run either today or tomorrow. People keep asking me what I regard as synthetics. It is very interesting that in schools, at the end of my address when I ask, "Are there any questions?" the kids put their hands up and say, "What about synthetics?" So that term is now getting into schools, which I think is quite amazing. The problem with the term synthetics is that it makes sense to call synthetic cannabinoids synthetics because they are man-made drugs that are meant to mimic cannabinoids. But then we have all of these other synthetic stimulants. The fact of the matter is that most stimulants are actually synthetics anyway, so it is a very, very complex question as to how you can call something a synthetic stimulant. I suppose I was trying to define it on radio as so-called legal highs. Basically, you have got amphetamines, ecstasy and cocaine, and then you have the more synthetic legal high versions of those. It is very difficult to classify them. And as more and more of them come out, it gets even more complex. What was the second matter?

**CHAIR:** The challenges that these drugs pose.

Mr DILLON: There are a couple of challenges. Defining them is a huge challenge. Trying to put them into a nice little box—which we like to do—is very difficult. The sheer number of them that are coming out is a challenge. The European Monitoring Centre for Drugs and Drug Addiction monitors all European States and has an early warning network. Last year that organisation identified 49 new psychoactive substances in a 12-month period; that is, almost one a week. Compare that to 2008, when it had 13 psychoactive substances. So we have just seen this absolute explosion of new psychoactive substances. As I understand it—and I have not seen this referenced—up to 30 June this year in the European Union the centre had monitored another 50. So this is like a snowball. When I was in Europe in December last year authorities were concerned because they were seeing synthetic cocaine, for example, and other synthetic drugs as well. A new version of ketamine, for example, has popped up. So this is a great challenge.

The other great challenge for us—and I have already mentioned this, but I will say it one more time from an educator's perspective—is that we know nothing about these compounds. If we want to be effective in terms of giving people quality information, so that they may make well-informed choices, we have to make sure that whatever we put out there is accurate—not put out there for political advantage to say we are doing something about the law on drugs, or something like that, or to try to scare people. It has to be real. Kids do not believe us anyway; and the more information we put out there that is not accurate, the less they will believe us. My concern is that when we do have something that we know is harmful, and we absolutely know the risk for those who use it, kids are simply not going to believe the warnings we put out there because we have cried wolf too many times. So we need to collection information on what we know, and then put it out there in an honest way. It may not be necessarily politically friendly to say, "We don't know," but at least it is honest.

**Mr CLAYTON BARR:** Mr Dillon, you started by saying that one of the things about the synthetic cannabinoids is that they work. Since then our conversation has expanded to talk about other synthetic drugs. Are there other synthetic drugs that you would also categorise as working?

Mr DILLON: The one that attracted the most attention in the beginning was methadrone—I suppose the first of the new-wave synthetic stimulants. I was in the United Kingdom when that started to really hit the headlines. What used to happen years ago was that a drug would be used in London in June 2000 and then we would see it here in June 2001, maybe 2002—it would take a long time. Now, with the internet, things happen very, very quickly. When methadrone came onto the market, to evade whatever, it sold as plant fertiliser, it was sold as bath salts in the United States. It has never been sold as either of those here; it has been sold flat as

methadrone. But what happened was that people got the notion that it was really good stuff; everything was quoted as saying it is like a cross between ecstasy and cocaine and people were literally importing it by the kilo. They were bringing it in and they were buying a lot of it, and it was not being stopped because no-one really knew what it was. If it did get stopped it just sort of got held. That worked. It was a high-quality drug that certainly had the effects that it was purported to have.

Since that time there has been a range of others. At the moment if you go onto websites—and there are a number of them that are Australian-run that talk about the drugs that are legally available here—the big ones at the moment are the drugs that mimic the effects of cocaine. If you go into internet chat rooms and you have a look at the conversations that people have, none of them are saying that this is rubbish; they are all saying, "This is great, I am having a fantastic time; it lasts a long time; I don't have a come down." When users are in chat rooms saying that about a legal high, that is a new phenomenon. Usually people write, "This was 40 bucks and it was a waste of my time". They are working. As I said, it is a unique phenomenon because that is not typically what happens.

Mr CLAYTON BARR: I absolutely agree with your statement that we have to know with some good science and knowledge before we go making statements about whether things are good or bad for us so that, in particular, young people can trust us. Whilst the manufacturers keep on changing the product we are never going to get that information or base knowledge to hand out to the general community. What are your thoughts about the dangers of that and trying to rein that in or ride the wave? How do we as a broad community cope or deal with that?

**Mr DILLON:** I think it is about looking at what we do know, and I think the most important message that we have around any of these substances is that they are so new that when a chemist analyses them the compounds do not make sense to them; they look at them and say, "What is this? We have never seen this before". In America two days after Obama created the new legislation that was meant to encompass all of the new compounds, two compounds were analysed by a laboratory that were not under the legislation. The names of those were sort of XLB 172. I think a very strong message to give to young people is, "This is XLB 172. Does that sound like anything fun? We do not even know what this is". To me, that is a strong message to send to someone that "This is what we would usually give rats in a laboratory. Do you want to be a rat in a laboratory?" There will be some young people who will certainly go "YOLO. Don't care". But I think it is a pretty strong message.

If we turn around and say, "This will kill you", and 20 of their friends use it the next day and they are not dead, you have totally lost credibility. In this country the people who give out information about drugs are police and drug researchers. No-one believes police and drug researchers.

#### **Mr CLAYTON BARR:** Are you not a drug researcher?

**Mr DILLON:** I think that is a really good point. Drug users do not believe them and I think it is really important to start thinking who would they listen to and what are the messages that are, first-off, accurate and, secondly, honest? If we do not know, you know what—"I don't know" is a pretty good response. I think what New Zealand is doing is really exciting. I think it is a very good model—the whole idea of making these people who are manufacturing these products say, "Okay if you believe you are a quality product you are going to have to be like the pharmaceutical industry: prove it before you sell it". I think that is a really good strategy, but it is a complex one.

**Mr STEPHEN BROMHEAD:** Part of their strategy is that the products are banned—there is a temporary notice saying it is basically banned until they can prove that it is a safe product. What you think about the idea of having the temporary ban until it is proven to be safe?

**Mr DILLON:** I think New Zealand is also doing a couple of other things at the same time. I think it is not as simple as "Okay we are going to ban it"; it is trying to get out quality information at the same time to make it very clear to users that we are treating this from a whole approach rather than we are just going to ban them until they can prove it; I think it is much more than that. I do not think you have much of a choice. If you are going to treat it like the pharmaceutical industry, the pharmaceutical industry cannot sell their product—they cannot sneak it out—it is banned until it is proven. But, once again, I think what the Government has done is that it has made it very clear that it is going to treat this in an adult way; it is not going to be just "We are just going to ban it and hope for the best". If you believe your product—and certainly there are people out there who

have already put in their money to get these products through this regime, so they do believe that they are relatively, not harmless, but less risk than people say they are.

If you do ban—and I think this is the great problem that we have had in this country for a very long time and I certainly need to make it very clear that I am not a person who supports the legalising of drugs; I certainly think decriminalising is a great idea but I am certainly not pushing for that sort of model—the message that we have had of when something pops up and there is a bit of harm, the media goes completely bizarre and the Government just turns around and says, "Well, we will ban it". What we have seen over the years when they have banned it—they banned GHB, fantasy, whatever you want to call it, and it instantly became 10 times more popular. They banned ketamine. We kept saying, "Don't ban it. If you ban it, it will become popular." Literally in the next 12 months ketamine spiked in terms of popularity.

When you ban something without education, without doing something else, it just explodes. All of a sudden people go, "Gee, that sounds really interesting". People did not even know about it before. You can go back to 1995 when Anna Wood died after taking ecstasy. The media did such an appalling thing back then. If you look at the figures, ecstasy use was low in the nineties. Anna Wood died, ecstasy became a huge media story and straightaway ecstasy use spiked. It is an awful thing to say but it was almost like an advertising campaign for it because all of a sudden there were stories on where you could get it and how much it cost. At one point or another we are going to have to take a step back and say okay, of course if something is going to cause you harm or you think it is at risk of causing you harm—which I am sure many of these drugs do—if we are going to ban it let us do it the sensible way and let us put out some education at the same time we ban it, to provide information to people about what we know. Even if it is that we do not know anything, it is better than just policing.

**Ms SONIA HORNERY:** I am interested in your experience as a former teacher and talking to young people. Just anecdotally, is it popular among young people and how do they get hold of it?

**Mr DILLON:** I think if I had been asked this question maybe three or four months ago I would have said I do not think they even know it exists, but certainly, once again, the media attention has been quite phenomenal. In terms of synthetic cannabinoids particularly, I am meeting more and more young people—I am more than happy; I have got a few emails from young people who have contacted me after I have been at a school who have no desire to use an illegal drug. I think everyone has their line in the sand and many young people do not want to do something illegal and then they are told that there is this product that you can buy from the local tobacconist, which is legal. They go and use it, they are not prepared for the experience and they have some pretty nasty experiences.

Pretty well everything you read—and the literature is limited—the mental health effects are the most reported that I see: kids who have anxiety, paranoia, and it is not like short-term; it can be weeks and months of it. Usually I have to say to the young people, "You need to see a GP. You have got to contact the Kids Helpline. You have got to do something", because they are so anxious about it. Where do they get them from? The schoolkids that I am seeing are getting synthetic cannabinoids primarily from tobacconists. It is interesting because I know some people who run shops, or I have contact with people through my job and through the work I have done over the years, particularly head shops, trying very hard to keep within the law. When I have contacted them and said I have had kids who have told me they have bought them from shops, they are horrified; they say it is something they would never do; they do not want to have their stuff taken off them. So it tends to be unscrupulous tobacconists. I have to say there are at least three or four in the city that are doing it. Certainly it is well known that they are the ones you go to, and kids identify those pretty quickly.

The other interesting thing that the kids have been telling me, which I have not been able to verify because, to be quite honest, I am not going to go in and try and buy them, when a product becomes illegal—and there are a number of them that are illegal—they will get a new product in where the manufacturer will say, "These are not covered by the legislation; these are legal". I suppose the more responsible sellers send back the illegal product and keep the legal product. But what the kids are saying is that if you take the wrapping off the new legal product it is the old product just rewrapped. When I spoke to a couple of people who I know, my contacts in the area, once again they were horrified; they said, "My goodness me, it just wouldn't be worth our business to do that". But I think when you are a small tobacconist that no-one really notices, you can sort of understand how it would happen.

**Mr CLAYTON BARR:** You have given some great anecdotal recounts and recollections. Have you done any specific research, any specific data or published any specific papers with any of this data?

**Mr DILLON:** The only person who really has done any research on it would be Monica, who was here before. In terms of the National Cannabis Centre, because we are funded by the Australian Government and we are a prevention and information centre, we are not funded to do research; that is not a part of our brief. That said, we assisted with an online survey that Americans did on the topic, and there was an Australian sample there. Then of course there is the National Drug and Alcohol Centre's EDRS and IDRS report, which I think they sent through in their submission, which shows that certainly synthetics, particularly synthetic cannabinoids, were being used.

In terms of hard data, I just do not think it is around. I do not think it would be very difficult to collect. I think if there was money available you could do a very quick down-and-dirty study to find some users and get the different groups. I think we have also got to remember who the synthetics, particularly the cannabinoids, are particularly attractive to, and I think there are three groups. The first ones are those people trying to avoid workplace drug testing, and it is certainly how it exploded.

Then you have got young people who just simply do not want to break the law. They want to get off their face but they do not want to break the law. The third group is a really interesting one. My contacts in the head shops are saying it is older cannabis users who just do not want to have problems with the law; they do not want problems with sniffer dogs. They want to move away from their drug habit but they still want to have a high, so that is who is attracted to it. The responsible head shops are saying that is the bulk of the people to whom they are selling the synthetics. I have had that clearly stated a number of times. The online stuff tends more to be the workplace drug testing, the minors and those sorts of groups.

**CHAIR:** The majority of young people who are under age and cannot buy these products from a tobacconist—or they should not be able to buy these products from tobacconists—do you think that they acquire these products online?

**Mr DILLON:** I doubt whether it would be online. Most of these young people are still living at home and it is difficult to get through. Certainly the young men I have spoken to directly—I was at a school a couple of weeks ago when I spoke to a group who were purchasing them in town. They said they had been able to buy cigarettes since they were 13, 14, without much of a problem. Young people know the tobacconists from whom you can buy cigarettes, so it would be a similar thing.

**CHAIR:** You spoke about the bulletin that you said you had put a lot of work into. You have a section here on harms associated with synthetic cannabinoids. Will you discuss those in detail in terms of some of the anecdotal experiences, harms and adverse health effects that you are aware of from these products?

**Mr DILLON:** Almost all of the data that we have that I pulled together for that bulletin was basically European. Some of it was American. It is really done on the first synthetic cannabinoid that was identified, which was JWH—I have lost my train of thought.

**CHAIR:** Is that 018?

**Mr DILLON:** Yes. Most of the data is on that cannabinoid. The fact is that that one is not around anymore. The problem is how to keep up. The papers that are coming out currently are still on JWH-018. If you look at the compounds that are being identified, we do not know what that one is. Can we assume it would be similar? I think we can. You could most probably assume it would be a similar effect. I do not think you can state categorically that it would be, particularly now when you have a substance that has been tweaked, and tweaked, and tweaked, and tweaked to a point that it could be a completely different cannabinoid now.

Certainly people who were using JWH-018 originally—the original Kronic would be a great example of that. The original Kronic did appear to be JWH-018. I do not think we can know for certain whether it absolutely was, but it would appear that it was. Certainly now the Kronic is nowhere close to JWH-018. It is something else. What we can say is because it is a cannabinoid and works on cannabinoid receptors in the brain, you would imagine it would have similar effects. The effects that are reported in the literature tend to be around paranoia, anxiety, extreme mental health issues, which are very similar effects that some cannabis users experience with their drug of choice.

**CHAIR:** Going back to something you said earlier in terms of young people looking for a legal alternative, wishing to abide by the law, do you think that from the experience that you have had with young

people, not simply using this as a substitute, but do you think this could eventually lead to young people going down the route of taking prohibited substances?

Mr DILLON: What you have to remember is that how we educate young people about drugs tends to be based on a great myth: you take this and you will die. We tend to always focus on the absolute worst-case scenario. That works incredibly well when you are 10. You say, "When you do this, these bad things will happen." If you keep pushing that line, which we do, what happens is that if they decide to cross that line at some point, and it could be that they have a synthetic cannabinoid at a party when someone says, "This is legal. It's like cannabis, but don't worry, it's legal", and they have a phenomenal time, then they go, "Well, I didn't die. I have been told for years and years that if I take drugs, I will die. Well, I haven't died, so what else have they lied about?"

That is a great danger of how we talk about drugs. We always talk about the worst-case scenario. When I talk to kids about drugs I say, "Okay, why would someone take this?" I talk about why people do it. Basically most people take drugs because it is fun. We might not like that, but that is a fact. That is why people drink. That is why people do anything: because they get some pleasure out of it. You talk about that and you say, "That is the pleasurable effect, but here is what can go wrong." You acknowledge the positive and then you challenge with the negative. You give them all of the information so they can make a choice. The fact of the matter is that most people, if they do decide to take drugs, end up stopping. The reason they stop is because the bad outweighs the good. It is really important that we tell them that, "Yes, this is the reason people do it, but here is the bad stuff. If we keep going, this will kill you." Do not do it, do not do it. It is bad, it is bad, it is bad. That certainly works for some people. It is really important. There are some people who will never cross that line. You can throw heroin at them, you can throw ecstasy at them and they are never going to do it. But if you are on that line and you give them false information, you run the risk of pushing them over the line.

**CHAIR:** We have heard from a range of people from various backgrounds: academics, members of Government departments, the police. One thing we have not heard much about is education. We heard earlier today there was a view that we have to be careful about educating young people at school about these products because it would raise awareness of them, as you have said, and that could lead them to then experiment. Will you talk about the way you would see an effective education campaign being run in New South Wales in respect of synthetic drugs?

**Mr DILLON:** My philosophy about drug education is that we certainly want prevention. Prevention is the best. Prevention is what we would seek to do. Can we stop people taking drugs? Most probably not. As man, we want to change where we are at. Everyone does, whether it is a cup coffee or whether it is alcohol, whatever. What we do know is that the greatest harm is going to be experienced if you start doing things early—a developing brain, all those sorts of things. At the very least, we want to push the first time they ever do anything to when they are older, whether it be drinking, smoking, whatever.

The key to good prevention is to first work out what is actually happening. "Okay, why are people doing the different things?" This is our great problem with alcohol. Why we fail at alcohol so dismally is because we do not talk about it in primary school. If we spoke about it in primary school before they started drinking, we would have a chance of doing something about it. When you start talking about alcohol at the age of 14 and two-thirds of the class are already drinking, what is the point?

There are certain substances that you do have to be worried about raising awareness. Certainly one that we know about in terms of drug education is solvents, for example, spray cans. The reason you have to be careful about that is it is too accessible. If you start talking about spraying hairspray into a paper bag, there is going to be some little thing who decides, "I've got hairspray at home and I've got a paper bag. Let's try it." It is about access. Synthetics are a little bit different. You have to be in a friendship network to access them. Realistically you are not seeing a lot of 13-year-olds and 14-year-olds who are messing around with these products. You are talking about more sophisticated kids: 15-year-olds, 16-year-olds is the minimum age you would see them using.

It is about trying to get good quality information. If young people are not using them and you get good accurate information early, then hopefully you can prevent them from even being interested in them. Does that make sense? The whole issue about raising awareness and possibly promoting use really does only relate to drugs that they have easy access to. I do not think it really works for a lot of other drugs that are difficult to get. Most of these drugs are not as simple as going somewhere and picking them up from your local deli, no matter what the *Daily Telegraph* says. You have to know someone; you have to have a friendship network. It is about

what information you provide in a school setting. If you are talking to year tens about synthetics, a message that would be very, very effective would be, "We know nothing about these. It would be like us feeding a chemical to a rat. What would you do?" We would be investigating what that would do to a rat. These are new compounds. That would be a very effective prevention message for a child who is not involved in it.

**CHAIR:** Do you have the view that we could do a lot more as a Government in terms of educating young people in respect of these products?

**Mr DILLON:** Yes. I think great challenges face the education department now because the drug unit has been basically de-funded. That is a big issue. They were doing wonderful stuff and now that does not really exist anymore. I do not know who would be developing those sorts of resources because that unit is not there anymore.

**CHAIR:** Thank you very much, Mr Dillon, for coming in today and addressing the Committee. The Committee might write to you about issues that have arisen over the course of the hearings. If you are happy to respond to those, they will form part of the evidence that you have given today. Would you be happy that we wrote to you if any issues do arise?

**Mr DILLON:** No problem.

CHAIR: Thank you. That concludes today's hearing. Thank you very much.

The Committee adjourned at 4.11 p.m.