

February 9<sup>th</sup>, 2009

## **Statement of David Erceg-Hurn to Governor Schweitzer and Montana Legislature regarding funding of Montana Meth Project in 2009 budget**

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### **Summary of statement**

- The Montana Meth Project runs an expensive anti-meth graphic ad campaign in Montana.
  - The Montana Governor and Legislature have to decide whether to fund the Meth Project in 2009.
  - The Meth Project claims that its ad campaign has been an extraordinary success. They claim that their ads have dramatically changed teenagers' attitudes towards meth, and reduced meth use.
  - In 2008 I conducted a study in which I examined the accuracy of the claims the Meth Project has made to policymakers about the effectiveness its ads.
  - The key finding of the study was that many of the claims the Meth Project has made are not supported by evidence.
  - The legislature should not fund the Meth Project's ad campaign in 2009.
  - Funding should be redirected to evidence-based meth prevention programs that high-quality, independent research has shown are effective.
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### **Who am I?**

My name is David Erceg-Hurn. I hold a First-Class Honours degree in Psychology from Curtin University of Technology in Western Australia, and I am currently undertaking a PhD in Clinical Psychology at the University of Western Australia. My training has strongly emphasized the importance of critically evaluating psychological research.

### **Why am I submitting a statement to the Montana Legislature?**

In 2008 I conducted a study in which I critically examined claims that the Montana Meth Project has made about the effectiveness of its graphic anti-meth advertising campaign. I did this by examining press releases and research reports published by the Meth Project on its website. My study was published in the December 2008 issue of *Prevention Science*, the peer-reviewed journal of the Society for Prevention Research, an international organization concerned with the prevention of social, physical and mental health problems and the advancement of evidence-based prevention programs. The study was critical of the Montana Meth Project.

My study attracted attention from the Montana media, national press, and international media. It also attracted the attention of the Montana Governor, Brian Schweitzer, who has set aside \$500,000 in his 2009 budget to fund the Meth Project. Schweitzer announced in late December 2008 that he would review funding of the Meth Project, and he invited me to Montana in January 2009 to discuss my findings with the Legislature. I was unable to travel from Australia to Montana, due to financial constraints and prior commitments. As a result, I prepared this statement as my contribution to the Legislature's debate about funding the Meth Project. In this statement, I provide an overview of my study, key findings, and recommendations.

**Why did I decide to investigate the Montana Meth Project?**

I discovered the Meth Project in 2007 while conducting research into graphic anti-drug advertising. I noticed that the Meth Project and its proponents were claiming that the graphic anti-meth ads had been extraordinarily effective. For example, Meth Project founder Tom Siebel testified before the Senate in 2007 that, “the Meth Project results in Montana have been more significant than any drug prevention program in history.” Claims such as this attracted my attention because they appeared to contradict previous research, which has shown that fear-based anti-drug campaigns are often not very effective, and are sometimes harmful. For example, the federally-funded *National Youth Anti-Drug Media Campaign* uses a similar approach to the Meth Project. This large-scale media campaign has cost taxpayers over \$1.5 billion since 1998. Several independent research studies and a Government Accountability Office (GAO) report have found that the ad campaign has not reduced drug use. The only significant results have been in an unfavorable direction - some youths *increased* their use of marijuana after being exposed to the ad campaign.

Given the discrepancy between previous research and claims made by the Meth Project and its proponents, I decided to critically evaluate the claims that were being making, to establish whether they were valid and supported by evidence.

**Theory behind the Ad Campaign**

The basic theory behind the Meth Project’s ad campaign is that teenagers use meth because they think doing so is socially acceptable and not dangerous. The ads aim to change these perceptions by scaring teenagers into thinking that meth use is dangerous and socially unacceptable. It is assumed changing teenagers’ attitudes will lead to changes in behaviour (i.e., reductions in meth use).

**The Meth Project’s Research Strategy & Claims**

The Meth Project commenced its ad campaign in October 2005. Prior to the launch of the ads, the Meth Project paid a public relations company to conduct a survey of hundreds of Montana teenagers’ meth use and attitudes. Follow up surveys were conducted in 2006, 2007 and 2008. The Meth Project published the results of these surveys on its website, and publicized the results by issuing several press releases. The surveys and press releases portrayed the ad campaign as an unqualified success.

The Meth Project and its supporters have made many claims about the impact of the graphic ads. Common claims include:

- Since the ad campaign was launched, teenagers have become much more aware of the risks / dangers involved in meth use
- Teenagers now strongly disapprove of meth use
- The ads have reduced teenage meth use in Montana

I systematically examined the Meth Project’s 2005 – 2008 surveys to evaluate whether these claims were supported by the Meth Project’s own research results.

## Evaluating the Claims

*Claim # 1 – Since the launch of the ad campaign, teenagers have become much more aware of the risks / dangers involved in meth use*

As part of the Meth Project's surveys, teenagers were asked to indicate how much risk they believe there is that using meth could lead to 14 specific negative consequences, such as dying or becoming violent. The percentage of teenagers who responded that there is a "great" or "moderate" risk that meth use could lead to the negative consequences is displayed in the table below.

Q. Please indicate how much risk you think there is that each of the following would happen to someone who tries meth once:	% of teenagers who said there is a "great" or "moderate" risk		
	2005 Before Ads	2007 After Ads	Change
1. Getting hooked on meth	95	92	-3
2. Becoming violent	88	88	0
3. Having sex with someone they don't want to	90	90	0
4. Dying	84	84	0
5. Making their problems worse	90	92	+2
6. Being a negative influence on a younger brother / sister	92	94	+2
7. Turning into someone they don't want to be	90	93	+3
8. Becoming paranoid	84	87	+3
9. Getting insomnia or not being able to sleep	83	86	+3
10. Losing control of themselves	89	92	+3
11. Suffering brain damage	86	89	+3
12. Stop taking care of their hygiene	80	86	+6
13. Stealing	80	89	+9
14. Suffering tooth decay	69	82	+13

From Meth Project 2007 Survey, p.53. Data from 2008 is not displayed because the Meth Project did not report it in their 2008 survey.

Two things are apparent upon inspection of the table. The first is that in 2005, *before the ad campaign commenced*, over 80% of teenagers thought that there was a substantial risk that using meth could lead to most of the negative consequences. This raises questions about the soundness of the theory underlying the Meth Project's ad campaign, which is that teenagers need to be educated about the dangers of meth use because they do not think that taking meth is dangerous. Teenagers appear to have believed that meth use was dangerous *before* the ad campaign started.

The second thing that is apparent is that in 2007, following two years exposure to the Meth Project's graphic ads, teenagers attitudes were virtually the same as they were in 2005. For only 3 out of the 14 risks was there a positive change of more than 3%. This suggests that the Meth Project's ads have had little impact on teenagers' perceptions of the specific risks of meth use.

In addition to being asked about 14 *specific* risks of meth use, teenagers were also asked about their overall, *global* perceptions of the risk involved in meth use. Assessing global perceptions of risk is important, because it reveals the impact that beliefs about the 14 specific risks have had on teenagers overall attitudes towards meth. These overall, global

perceptions about the dangers of meth use are more likely to influence meth use than perceptions of specific risks.

The percentage of teenagers who agreed that meth use is risky was 93% before the ad campaign commenced (in 2005), and 87% following six months exposure to the ads. Again, these figures suggest that most teenagers already thought that using meth even once was dangerous *before* the ad campaign commenced. After six months exposure to the Meth Project's graphic ads, teenagers were *less likely* to think that using meth is dangerous. This change is in the *opposite* direction to that the Meth Project was trying to achieve.

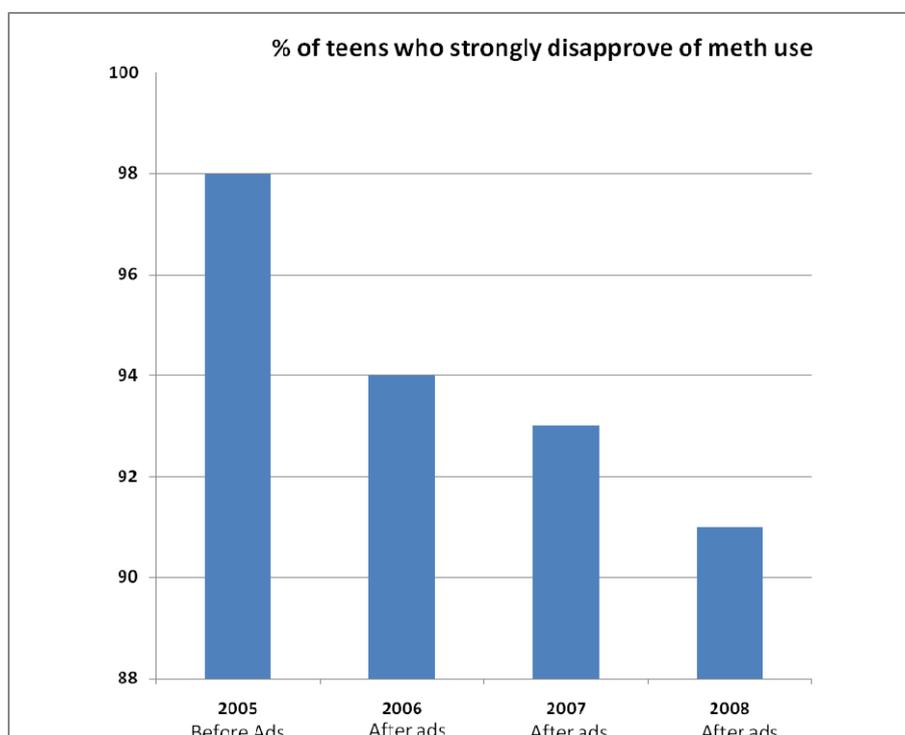
The percentage of teenagers reporting that meth use is *not at all risky* increased, rising from 3% before the ad campaign commenced, to 8% six months later. Again, this change is in the opposite direction to that the Meth Project was hoping to achieve.

Note – For the global risk questions, I have only reported figures from before (2005) and six months after (2006) the ad campaign was launched, because the Meth Project failed to adequately report the results of these questions in its 2007 and 2008 surveys.

### *Claim #2 - Teenagers now strongly disapprove of meth use*

The Meth Project has claimed that there is a strong and increasing social stigma against meth use in Montana. This claim does not appear to be supported by the Meth Project's survey data. Teenagers were asked how much they approved or disapproved of using meth. The percentage of teenagers reporting that they *strongly disapprove* of teenagers regularly using meth is displayed in the graph below.

#### *Percentage of Montana Teenagers who Strongly Disapprove of Regular Meth Use*



Two things are apparent upon examining the graph. The first is that the vast majority of Montana teenagers (98%) strongly disapproved of regular meth use *before* the ad campaign commenced (2005). The second is that the percentage of teenagers who strongly

disapprove of regular meth use has been steadily *declining* since the Meth Project's ad campaign was launched in late 2005. By 2008, only 91% of teenagers strongly disapproved of meth use. This change is in the *opposite* direction to that the Meth Project has been trying to produce.

*Claim #3 - Teenage meth use in Montana has declined*

It is very common to read the claim that the Meth Project's graphic ads have reduced teenage meth use in Montana by 45%. This claim is dramatic and makes the Meth Project's ad campaign seem like a success. However, the claim is not supported by evidence from the Meth Project's own surveys.

Teenagers were asked "In your lifetime, have you ever used meth?" The percentage answering "yes" is found in the table below.

**% of Montana teenagers who have ever used meth**

Year	2005	2006	2007	2008
%	2	6	4	3

Before the ad campaign (2005), only 2% of teenagers had ever used meth, but six months after the launch of the ad campaign (2006), 6% reported using meth. These figures indicate that the percentage of teenagers using meth in Montana *increased* following the launch of the ad campaign. By 2008, 3% of teenagers reported using meth, still *more* than before the ad campaign commenced.

In addition to being asked if they had ever used meth, teenagers were also asked if they had tried meth in the past year. The percentage replying "yes" is found in the table below

**% of Montana teenagers who have used meth in the *past year***

Year	2005	2006	2007	2008
%	1	5	2	1

Before the ad campaign launched, only 1% of Montana teens had used meth in the past year. Following six months exposure to the ad campaign, this had jumped to 5%. By 2008, the figure was back to the same level as before the ad campaign launched.

In summary, the Meth Project's own surveys indicate that teenage meth use in Montana has not declined, but may have increased slightly.

The Meth Project have based their claim that teen meth use has dropped by "45%" not on their own survey data, but on data from another survey, called the Youth Risk Behavior Survey. This survey is conducted every two years by the National Center for Chronic Disease Prevention and Health Promotion (CDC). For the Youth Risk Behavior Survey, samples of Montana teenagers were asked if they had ever tried meth. The percentage reporting "yes" is displayed in the following table.

**% of Montana teenagers who have ever used meth (YRBS data)**

Year	1999	2001	2001	2003	2005	2007
%	13.5	12.6	12.6	9.3	8.3	4.6

The YRBS data indicates that teenage meth use in Montana has declined since the Meth Project's ad campaign was launched in 2005. However the YRBS data also shows that meth use was dropping for at least 6 years prior to the launch of the ad campaign.

The *absolute* drop in meth use since the ad campaign was introduced in 2005 is 3.7%. Similar absolute drops in meth use occurred in the years prior to the introduction of the ad campaign. For example, meth use fell by 3.3% between 2001 and 2003. This suggests that if meth use is declining, factors other than the ad campaign are involved / responsible for it.

### Summary of the Evidence

Several of the core claims made by the Meth Project and its supporters about the impact of the graphic ad campaign are contradicted by the Meth Project's own survey data. The Meth Project's surveys indicate that:

- the vast majority of teenagers already thought that meth use was dangerous *before* the Meth Project's ad campaign commenced
- the vast majority of teenagers strongly disapproved of meth use *before* the ad campaign commenced
- since the ad campaign commenced, the number of teenagers reporting that meth use is *not* risky has *increased*
- teenagers are now *less* likely to disapprove of meth use
- according to the Meth Project's own survey data, teenage meth use in Montana may have increased slightly since the ad campaign was launched
- according to an alternative dataset (Youth Risk Behavior Survey), teenage meth use in Montana may have decreased since the launch of the ad campaign. However, the Youth Risk Behavior Survey indicates that meth use was declining for several years prior to the launch of the Meth Project campaign.
- if meth use has declined, there is no evidence that it is due to the ad campaign. Other factors are likely to be involved.

### Why do people think the ads are effective?

The findings above clearly suggest that the Meth Project's ad campaign has not been the dramatic success that the Meth Project and its supporters have portrayed it as. Why then do so many people seem to be convinced that the Meth Project's ad campaign is effective? The answer to this appears to be in the way in which the Meth Project and supporters have promoted the effects of its ad campaign to the public, policymakers and the media.

#### #1 – Focus on positive outcomes

When promoting the effects of its ad campaign, the Meth Project and proponents have focused on positive findings rather than highlighting negative outcomes. For example, proponents repeatedly claim that teen meth use in Montana has declined by 45%, even though the Meth Project's own survey results don't show this to be true.

#### #2 – Ignoring unflattering outcomes

The Meth Project has not highlighted for the media, public or policymakers the negative findings in its surveys. In 2006, the Meth Project put these negative findings in an appendix in the survey it released to the public. For the 2007 and 2008 surveys, the Meth Project did not report any data for several questions that returned unflattering results in 2006, even in the appendices of its reports.

Because the Meth Project has been selective about the data it has made public, it has been difficult for anyone to accurately assess the impact of the Meth Project's ad campaign.

### #3 – Turning negative outcomes into positives

Another reason people may believe the ads are effective is that the Meth Project and its supporters have recast unflattering research findings in a positive light. For example, the Meth Project claimed in their 2008 report that “The great majority of Montana teens (84%) *now* voice strong disapproval of trying meth even once or twice.” Including the word *now* in this statement implies that the percentage of teenagers who strongly disapprove of Meth use is higher in 2008 than it was before the graphic ad campaign commenced. However, the Meth Project’s own data shows that most teenagers strongly disapproved of single-time meth use *before* the ads started (2005), and the percentage was actually slightly higher then (88%) than it was in 2008.

### #4 – Framing results so they seem impressive

The Meth Project appears to have framed research findings so that they seem as impressive as possible. Take the common claim that “Teen meth use in Montana has declined by 45% since the ad campaign was launched.” According to the *Youth Risk Behavior Study* dataset, meth use dropped from 8.3% in 2005 (before the ad campaign commenced) to 4.6% in 2007. This is an absolute drop of only 3.7%, but a *relative* drop of 45% (3.7 is 45% of 8.3). However, it is the “45%” drop that is highlighted on the Meth Project website and in media releases.

#### **Meth Project’s response to my study**

Since my study was published, the Meth Project has attempt to discredit it by labelling me an “Australian” and claiming that the review was “limited,” “narrow” and “out of context.”

The fact that I reside in Australia is irrelevant to the issue at hand, which is critically evaluating the manner in which the Meth Project has presented its research to the public. I am well placed to do this, given my strong training in critically evaluating research.

The Meth Project has not presented any evidence as to *why* my study was “limited”, “narrow” or “out of context”. I disagree with the Meth Project’s claims. In preparing my study, I examined all of the press releases and research reports issued by the Meth Project over the past three years. From these I extracted the core claims the Meth Project has made about the impact of its ad campaign. I then examined the validity of these claims by systematically reviewing the Meth Project’s research reports. Many of the specific numbers discussed in my review have previously been highlighted by the Meth Project in their own press releases or on their website. The difference is that I outlined how several unremarkable or unflattering findings have been portrayed as “successes.” I also highlighted in my review several unflattering research findings that the Meth Project has not previously brought to the public’s attention. These unflattering findings are directly relevant to evaluating the accuracy of the claims the Meth Project has made about the success of its ad campaign. Taking numbers or direct quotes from the Meth Project’s own press releases and reports and examining their validity does not appear to be “selective”, “narrow” or “out of context.”

I would also like to point out that I acknowledged in my review that the Meth Project’s ad campaign has been associated with some positive outcomes. For example, fewer teenagers now believe that taking meth has benefits than before the ad campaign commenced. However, it is true that I focused more on the negative outcomes associated with the graphic ads, because there are many of them, they are important, and the Meth Project and its supporters have not highlighted them in the past. Policymakers need access to all

information about the effectiveness of the ad campaign, not only figures that portray the ads in a positive light.

I would also like to point out that I am not the only person who has raised questions about the Meth Project. Other researchers, some journalists and even some politicians have questioned the validity of the Meth Project's claims. For example, in 2006 Arizona Senator John Huppenthal sponsored a bill that would have funded the Meth Project in Arizona. However, Huppenthal then examined the Meth Project's 2006 survey data in detail and spotted many of the same unflattering outcomes that I uncovered in my study. Huppenthal talked to people from the Meth Project about the unflattering findings, but was unhappy with their responses and ended up withdrawing support for his own bill. Afterwards, Huppenthal told the Missoula Independent newspaper that he wasn't sure the people at the Meth Project, "had read and understood their own research," and that "I wasn't sure they were of a mindset where they even wanted to use the research to change their campaign, even though it's screaming to be changed."

### **Why might the ads backfire?**

Since my study was published, I have been asked why the Meth Project's graphic ads might backfire. One theory is that the ads might produce an unhelpful response in some young people called psychological reactance. The basic notion here is that most teenagers don't like being told what to do. Teenagers like to think that they are in control of their behaviour – including whether they decide to take meth. The Meth Project's graphic ads very forcefully attempt to persuade teenagers into not using meth. Some teenagers may interpret the not-so-subtle message conveyed by the ads as an attempt to forcefully control their behaviour. If this happens, these teenagers may rebel against the message in the ads – which means they can end up being more likely to approve of meth use. A considerable body of research since the 1950s has shown that forceful attempts to control people's behaviour can result in psychological reactance, and unwanted "boomerang" effects.

Another possible explanation is that some teenagers may react defensively to the scary nature of the ads. As a result of seeing the graphic ads, some teenagers may become anxious and worried that they will end up like the people in the ads if they use meth. Some teenagers may reduce this anxiety by telling themselves that using meth is not as dangerous as the ads make out. By telling themselves and acting as if meth use isn't dangerous, these teenagers have no need to feel anxious.

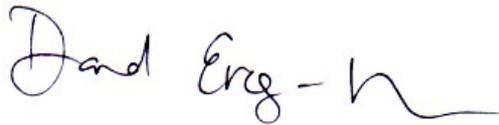
### **Summary and Recommendations**

The Meth Project's ad campaign has been running for over three years and cost millions of dollars. There is no compelling evidence that teenage meth use has declined as a result of the ads. Exposure to the ads may have a negative effect on some teenagers.

Given the Meth Project has not been able to demonstrate after three years that its ad campaign is effective, it seems inappropriate for the legislature to allocate public funding to the Project.

Rather than spending a large sum of money funding graphic advertising, the government should consider redirecting funds to alternate meth prevention programs that have been shown work in high quality research trials. I am not an expert on alternative meth prevention programs, but do know that they exist. For example, research funded by the National Institute of Drug Abuse has shown that an education program involving teenagers and their families called the *Iowa Strengthening Families Program* can result in substantial reductions in meth, alcohol and tobacco use. The Legislature should look into and consider rolling out evidence-based prevention programs such as this in Montana. Local and national drug prevention experts should be involved in this process.

I also suggest that meth prevention efforts be targeted at teenagers at high-risk of meth use. The Meth Project's survey data suggest that most teenagers hold very strong anti-meth attitudes and are unlikely to use meth. As a result, running an expensive ad campaign aimed at all teenagers in Montana – most of whom are not going to use meth anyway – seems like a poor use of resources. It may be more fruitful to try and prevent meth use amongst teenagers at high-risk of using the drug, rather than conducting an anti-meth campaign aimed at all teenagers.

A handwritten signature in black ink that reads "David Erceg-Hurn". The signature is written in a cursive style with a long, sweeping underline.

**David Erceg-Hurn**

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