# **Urine Amphetamine Screening, Informed Consent Is Useful Or Useless?**

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#### **Abstract**

Amphetamine addiction becomes an important narcotic problem in Thailand. Not only health but also social side effects of amphetamine abuse are well known. Urine screening for amphetamine is now widely used and introduced as one necessary test for narcotics screening. To test the hypothesis that inform consent may be not useful in performing this test, we performed this test on all 40 teenagers after previous asking for informed consent. All screening tests showed negative results. Comparing to the data from the police department in the same period and setting, up to 5 % of positive results can be obtained in forced screenings for urine amphetamine. Hereby, we debate if it is useful to perform this screening test in the clinical laboratory with the principle of informed consent.

#### INTRODUCTION

Amphetamine abuse becomes an important public health and social problem in the present day. Amphetamine is classified as a stimulant narcotic drug (King GR and Ellinwood, 1997). In the recent year, amphetamine becomes a seriously spread narcotic drug in Thailand. Although the best attempt of the government to control the outbreak of amphetamine abuse the problem remains a big problem.

Presently, the problem of Illicit drugs in Thailand can be defined as the transit point for narcotics en route to the international drug market from the communities of minorities in Burma and Laos. Although there have been effective eradication of some narcotic as heroin and cannabis, the amphetamine play dominant role as the common narcotic in Thailand (Dasananjali T et al, 1999; Verachai et al 2001).

Screening for drug abuse becomes a common clinical laboratory testing in Thailand. Also, the amphetamine becomes a requirement screening for many situations as screening before applying for a job and screening before going aboard. However, here the authors raise a debate topic that if inform consent is useful or useless in urine amphetamine screening test.

# MATERIALS AND METHODS BACKGROUND FOR DEBATE

The amphetamine becomes the major and most common

narcotic in Thailand presently. The pattern of abuse develops so much from the past time. Not only the main old users as the truck drivers group (Mongkolsirichaikul et al, 1988) but also the new abusers group, the children and adolescent in the school.

Presently, a number of different diagnostic kits for filed survey of amphetamine abuse as the urine amphetamine test kits has been produced. The screening test for urine amphetamine involves not only the medical but also the social aspects. The result can be used as the evidence in the court. However, concerning the users of these test kits, two major groups as the health care workers and the police.

Concerning the general principle of health care workers, the informed consent must be accepted before any diagnostic procedure. Also, it means that the objective, all steps of the procedure and the effect from the diagnostic procedure must be given to the subjects (Wiwanitkit, 2000). Furthermore, all subjects can be prepared and were allowed to decide to get or reject the diagnostic test. Unlike, the principle of the police,

Hence, we wondered that based on the two different principles, if the effectiveness of both performances was equal. We also wondered that asking informed consent was useful or not, therefore, this debate was set.

# **EFFECTIVENESS ANALYSIS**

To test the hypothesis that inform consent may be not useful in performing of this test, we studied the results of urine amphetamine screening test from different performances. The setting for this study was Pathumwan District, Bangkok, where there were a lot of entertaining places. Also, it is also known as the area with high rate of drug abuse among the teenagers. This study was performed during March 2001. At first, we performed the urine amphetamine screening test on total randomly selected 40 teenagers (22 males and 18 females). This group of subjects was still in the secondary school. All subjects were explained, left to prepare and decide according to the informed consent. Furthermore, they were allowable to collect the urine sample without closed strict control. All urine samples were analyzed by the medical technologists. The data from all urine tests were collected and recorded. Then we made a comparison of our result to the result of forced urine amphetamine screening test on total 60 teenagers performed by the police at the same setting. In comparison between both performances, we compared the detection rate of amphetamine abuse.

#### **RESULTS**

Interestingly, no positive urine amphetamine result was detected in the subjects with informed performance. Comparing to the data from the police department in the same period and setting, up to 5 % of positive results can be obtained in forced screenings for urine amphetamine by the police.

#### **DISCUSSION**

Substance abuse poses both economic and social threats. From the recent previous study of Verachai et al (Verachai et al 2001), pattern of drug addicts changed from heroin to amphetamine, especially among young students in the recent years. An important factor behind the boom in amphetamines -- known as ""ya baa' or ""crazy medicine' -- is an efficient new smuggling route which extends from the drug factories in the minorities communities in Myanmar and Thailand to Thai ports.

It is estimated that millions of amphetamine pills flooded into Thailand per year across its long border with Myanmar and Laos. Presently this drug addiction is reaching crisis proportions, with up to a million of Thais reportedly addicted of ya baa (Soomyai, 2000). The Office of Narcotics Control Board of Thailand has announced a plan to tackle the problem at the community level to ensure they are drugfree in the near future. Screening for urine amphetamine becomes an activity according to the control program.

At present, both health care workers and police perform the screening tests for urine amphetamine. Although the target of the two performances is the same, a critical difference in the method can be detected. Since the health care workers use the principle of patient rights, therefore, informed consent comes first. Hence, it can be expected that the abusers should reject to screen. Also in case that they accept, some special preparation or specimen contamination, purposing to disguise the screening result can be expected. Unlike the screening by the police, by legal enforcement, to request forensic examination to study possible conditions of drug addiction, the subjects were forced to collect the urine specimen without previous preparation. Also strict control of urine specimen collection can be done.

According to our study, in interest, null prevalence can be observed in the subjects asked for informed consent before screening. While up to 5 % of the forced subjects can be detected the positive result for urine amphetamine. Furthermore, considering the cost effectiveness of both performances, if we accepted the cost of urine amphetamine screening test as the cost and the detection rate as the effectiveness, the cost per detection by the police was also lower.

However, as we previously mentioned at the start of this paper, this is only a debate. A few data were focused. However, comparing the rate of the positive urine amphetamine samples in King Chulalongkorn Memorial Hospital (< 1 %) to the report of Police Department (up to 5 %) (Soomyai, 2000) fewer positive cases in the first setting were detected. Therefore, the urine amphetamine screening after asking for informed consent may be less useful than forced screening. Presently, in some country (da Costa et al, 2000) it is possible to request examination without informed consent, by legal enforcement.

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