

平成14年度厚生労働科学研究補助金（医薬安全総合研究事業）  
海外渡航報告書

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【1】 渡航先

バンコク（タイ）

【2】 渡航期間

平成14年9月24日～9月28日

【3】 渡航目的

2001年、タイ政府はタイ国の12～65歳の国民を対象とした初の「薬物乱用全国調査」を実施した。この調査の方法、結果を報告する「第1回薬物乱用に関するタイ全国会議(1st National Conference on Substance Abuse)」が、Office of the Narcotics Control Board(ONCB)の主催で、2002年9月25日～27日、バンコクで開催された。

分担研究者はONCBの参加要請に基づいて、タイにおける薬物乱用状況を把握し、「覚せい剤乱用に関する日本の状況：HIV/HCV感染を含めて」と題した講演により、わが国の実情を報告することを目的に、この会議に出席した。

【4】 渡航旅程

9/24 成田発ーバンコク着

9/25 第1回薬物乱用に関するタイ全国会議に出席し、拝聴すると共に、「覚せい剤乱用に関する日本の状況：HIV/HCV感染を含めて」と題した講演をし、わが国の実情を報告した。

9/27 バンコク発（機中泊）

9/28 成田着

【5】 渡航成果

初のタイにおける「薬物乱用全国調査」は、2001年3月～8月に世帯調査として実施された。対象は12～65歳のタイ国民である。対象数は37,616人である。

表1に違法薬物の経験率を示した。クラトンとはタイ特有の中枢神経興奮作用を持つ植物である。ヤーバーとは、メタンフェタミンを含有した錠剤である。

タイ全土をBangkok, Northern region, Central region, Northeastern, Southern regionの5地域に分けた場合、ほとんどの薬物乱用経験率はNortheastern地域で群を抜いて高いことが明らかとなった。

表1に見るように、ヤーバーの生涯経験率は大麻に次いで第2位であるが、1年経験率、1ヶ月经験率において第1位であり、ヤーバー流行の勢いが如何に強いかが推測される。また、1ヶ月に20日以上経験した者の割合では、入手が簡単なクラトンが第1位であるが、ヘロインが第2位にランキングされている事実は、ヘロインの依存性の強さを物語っている。

【6】 まとめ

タイにおけるメタンフェタミン乱用の拡大は、極めて深刻であり、錠剤型であるヤーバーの他国への拡大が懸念された。

（なお、分担研究者による発表内容は次項に提示した）

表1 違法薬物の経験率（補正済み推定値）

	生涯経験率	1年経験率	1ヶ月经験率	1ヶ月以内に20日以上経験した者の割合
何らかの違法薬物	16.4	4.3	2.2	0.3
大麻	12.1	1.5	0.5	0.03
クラトン(Kraton)	4.7	1.4	0.8	0.2
アヘン	2.0	0.1	0.03	0.004
ヘロイン	2.1	0.4	0.2	0.1
吸入剤	0.6	0.1	0.02	0.005
ヤーバー(Yaba)	7.8	2.4	1.1	0.04
エクスタシー	0.8	0.1	0.04	0.01
ケタミン	0.1	0.02	0.003	-
コカイン	0.1	0.01	0.002	0.001

# Japan's situation on methamphetamine abuse including HIV and HCV infection

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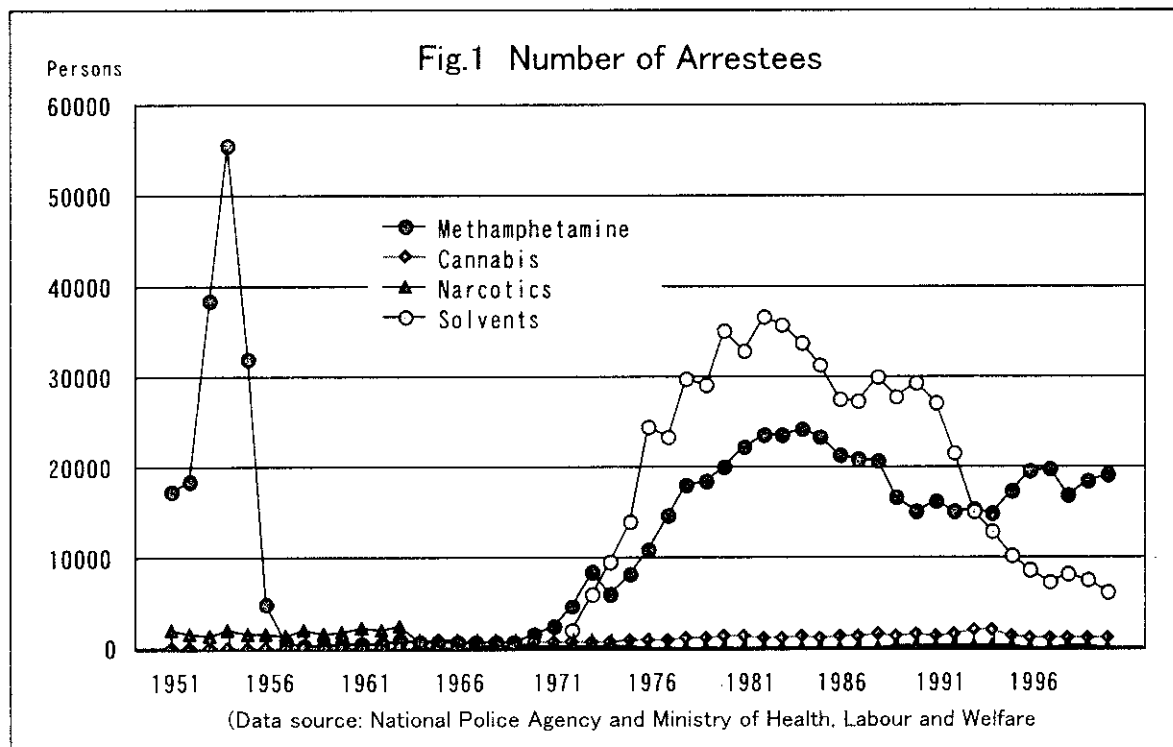
## First National Conference on Substance Abuse (ONCB)

27 September 2002

### 1. Characteristics of each epidemic of methamphetamine abuse in Japan

Japan has experienced an epidemic of methamphetamine abuse three times in the history (Fig.1). "The first epidemic" was between 1951 and 1957. "The second epidemic" was between 1970 and 1994, and "the third epidemic" started in 1995. Japan is facing the third epidemic now.

Table 1 shows characteristics of each epidemic of methamphetamine in Japan.

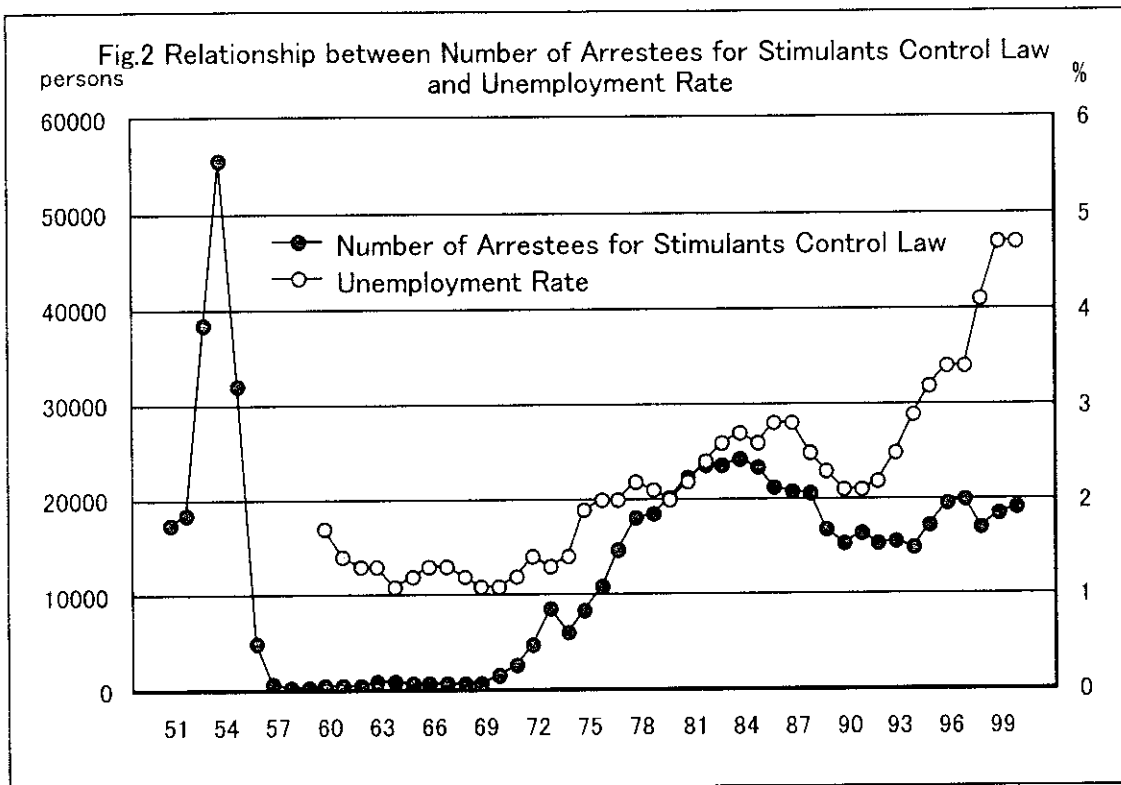


**Table 1. Characteristics of each epidemic of methamphetamine abuse in Japan**

	1 <sup>st</sup> epidemic	2 <sup>nd</sup> epidemic	3 <sup>rd</sup> epidemic
Social environment	# the pessimistic and pleasure-seeking atmosphere after the World War II # The bottom of economic collapse	# Social distortion due to rapid economical growth # Economic Depression (Oil shock)	# Internationalization : inflow of foreigners # Collapse of bubble economy # Revolution of communication tools: cell phone
Smuggling Resource	Domestic	South Korea, Taiwan	China ? North Korea ?
Street name	Philopon	Shabu	Speed, S
How to use	Oral, Injection	Injection	Inhalation, Injection

Before “the first epidemic”, dependency and psychotoxicity of methamphetamine were not yet known. As was the case in some other countries, methamphetamine was mainly used in the military in Japan. After the World War II ended, however, the stocks of methamphetamine were released from pharmaceutical companies and the military into the market. In the time of pessimistic and pleasure-seeking atmosphere, methamphetamine use became a social problem. “Philopon” was the most popular name of methamphetamine during this time. Some specialists even remarked, “Philopon would ruin the nation.” As a result of this critical situation of methamphetamine abuse, Stimulants Control Law was enforced in 1951. Since then, the use, manufacture, sale, purchase and possession of methamphetamine have been strictly controlled. Those days, methamphetamine was used orally and by injection. The supply sources of methamphetamine were confined within the country. The enforcement of the law was so effective that the problem of the methamphetamine abuse was actually put to an end in 1957. Thereafter, Japan entered a period of rapid economic growth.

“The second epidemic” started in 1970. Around 1970, Japanese economic growth suddenly fell. This economic deterioration promoted organized gangs to begin selling methamphetamine. In “the second epidemic”, all methamphetamine was imported from several Asian countries. This is one of the biggest differences between the first epidemic and the second epidemic. Methamphetamine was mainly abused by injection.



The street name was “shabu”. The name “Shabu” came from “Shaburu” in Japanese and it means “suck” in English, because methamphetamine makes you feel good as if your born is sucked, or a high dependence liability is strong as if your born is sucked. It implies that methamphetamine have strong potential of dependence. The name of “shabu” was exported to Philippines and named “Shabuu.”

“The third epidemic” started in 1995. It was caused by mainly three reasons. 1) Many foreigners came to Japan to get a job around 1990, but some of them lost their jobs after collapse of Japanese Bubble economy. 2) New electronic communication tools, especially cell phone, enable to smuggle the drug easily. 3) Fashion oriented atmosphere have become popular among young people. As an example, methamphetamine is called “speed” or “s.” They are English. English names sound more stylish for Japanese young people. Another characteristic of third epidemic was the dramatic change of how to use of methamphetamine. Inhalation of burning methamphetamine has become more popular. For young people, inhalation looks more stylish than injection. Inhalation does not have a risk for HIV infections, but it has potential to promote casual abuse of methamphetamine. This is one of the issues we concern about.

Figure 2 shows the relationship between the number of arrestees for methamphetamine-related crime and the unemployment rate. Those two lines are closely parallel. Methamphetamine abuse in Japan may be associated with the economic situation.

## **2. The current situation of drug abuse in Japan**

Japan has several kinds of data to describe the current situation of drug abuse in Japan.

- (1) National Police Agency Data: Number of Arrestees in Drug-related Crime
- (2) Nationwide General Population Survey on Drug Use and Abuse (by questionnaire)
- (3) Nationwide Junior High School Students Survey on Drug Abuse (by questionnaire)
- (4) Nationwide Mental Hospital Survey on Drug-related Mental Disorders (by questionnaire)
- (5) Nationwide Sentinel Survey on HIV/HCV Infection among Drug Abusers (by interview)
- (6) Emergency Room's data (by biological markers)

The Number of Arrestees in Drug-related Crime is just “a tip of the iceberg” of those who actually abuse or are dependent on drugs.

We cannot completely understand the accuracy (validity and reliability) of data obtained from questionnaires or interviews, because subjects may be afraid of reporting their illegal behaviors, such as drug use. Therefore, the drug related data from questionnaires or interviews is often underestimated because of such bias. A survey using biological markers can minimize this bias. However, in order to obtain biological samples, we always need informed consent. Particularly in drug related study, it is almost impossible to get informed consent from subjects due to their fear of being arrested. So, we are promoting a biological survey using “unlinked anonymous method.”

In unlinked anonymous method, we cannot identify a specific subject from biological samples. Due to the confidentiality of the samples, we can analyze the biological samples only. We cannot obtain the subjects' demographics and any data except for their ages and genders. WHO approves this method.

Table 2 show the data obtained from two emergency rooms in Tokyo metropolitan. We analyzed sample's urines and bloods. Among these samples, the prevalence of methamphetamine was 0% in one ER, but 2.7% in another ER. The prevalence of illicit drug use in ERs samples may be higher than in general population, because the patients are

Table 2. Prevalence of methamphetamine positive cases in emergency rooms

· Detection of methamphetamine from urine or blood samples in emergency rooms in Tokyo.		
· Unlinked anonymous method		
We can analysis X samples of X subjects, but can not get subjects' demographics and any data except for their ages and genders		
·Results:		
ER 1:	0 / 39 cases	0%
ER 2:	4 / 151 cases	2.7%

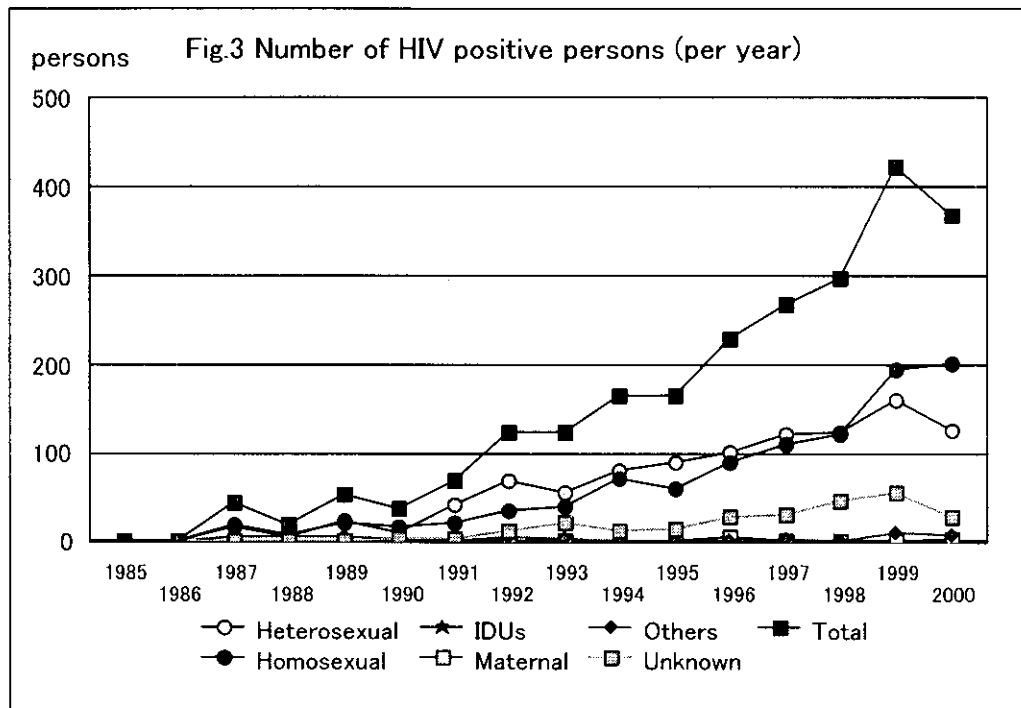
Table 3. Comparison of lifetime prevalence of drug use (%)

	General population (2001)	Junior high (2000)	ER (2001)
Solvent	2.0	1.3	
Cannabis	1.1	0.4	
Methamphetamine	0.3	0.4	0 – 2.7

carried to ER due to acute intoxication of drugs.

Table 3 shows comparison of the data obtained from our several kinds of surveys. The prevalence of solvent use is the higher than that of cannabis and methamphetamine in both general population and junior high students. Solvent has been abused mainly by junior high school students and high school students. Therefore, the prevalence of solvent abuse in general population has never become much higher than in junior high school students.

On the other hand, cannabis is abused mainly by adults, so, the prevalence of cannabis in general population is three times higher than in junior high school students. The recent trend of methamphetamine abuse among teenagers is characterized as the third epidemic of methamphetamine abuse. So, there is no large difference between the prevalence of methamphetamine abuse in junior high school students and general population. We can explain the data without any contradiction. The prevalence of illicit drug use in ER samples may be higher than in general population, because the patients are carried to ER due to acute intoxication of drugs. By summarizing these three types of surveys, we may conclude that the prevalence of illicit drug abuse in Japan is not so high.



### 3. HIV and HCV infection among drug abusers in Japan

In the most developed countries, injection drug users are one of the highest risk populations for HIV infection because of their needle and/or syringe sharing. Fortunately, the number of HIV positive people is very low in Japan.

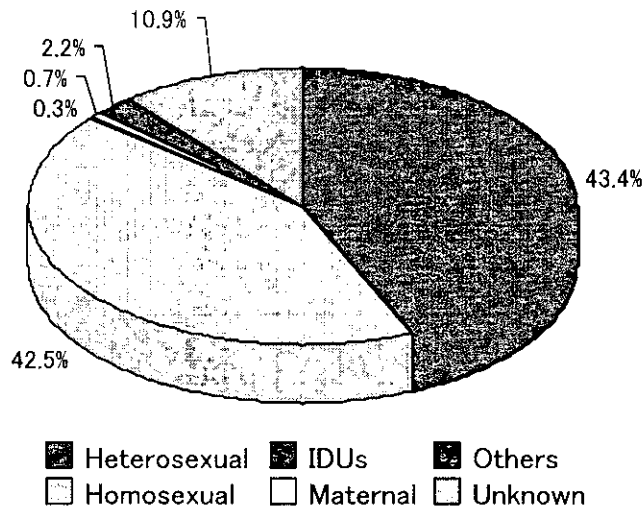
According to the national AIDS surveillance, the cumulative number of the HIV positive and the AIDS patients among Japanese were 2,390 and 1,407, respectively, in December 2000. Figure 3 shows the trend of HIV cases by transmission routes. Heterosexual and homosexual transmission had been two main routes. Homosexual sex without condom is the highest risk behavior in Japan. In terms of injection drug use, the new cases of HIV positive have been 0 to 2 every year.

Figure 4 shows the proportion of cumulative HIV positive patients by transmission routes. Heterosexual and homosexual transmissions are two main routes. In terms of injection drug use, the proportion is only 0.3%. It means that we found only 7 HIV positive cases due to injecting drugs.

For many people except for Japanese, this situation may look unique.

Therefore, I would like to present HIV infection among Japanese drug users, using the data from our sentinel survey.

Fig.4 Transmission routes of HIV infection  
cumulative number of the patients=2,390 (1985–2000)



We selected 6 to 7 mental hospitals that have about 20% of all methamphetamine-related inpatients in Japan. Using one on one interview with questionnaire, all the inpatients with drug dependence of those hospitals are interviewed by psychiatrists.

Table 4 shows the number of subjects by types of drugs. Methamphetamine and solvents are main drugs in Japan. It is the same as the results obtained from mental hospital survey, because this survey was also conducted in mental hospitals.

Table 5 shows physical marks observed in methamphetamine-related patients. Nineteen to 33 % of them had tattoos. Eight to 12% had amputated finger joints. Tattoos are popular in Yakuza society. In Yakuza society, if someone in the member breaks their rules, he is often punished by self-amputation of their own finger joints. So, The data suggest that among methamphetamine-related patients, there are not few patients who have any relationship with Yakuza society. On the other hand, solvent abusers frequently attach burning cigarettes on their hands during their solvent inhalation. So, the scar of burning cigarettes means experience of solvent abuse. Solvent is a gateway to methamphetamine in Japan.



Table 4. Number of the subjects by types of drugs (2001)

Methamphetamine	328	72.7%
Volatile solvents	62	13.7%
Multiple drugs	25	5.5%
Hypnotics	18	4.0%
Opiate	8	1.8%
Hallucinogens	4	0.9%
Cannabis	2	0.4%
Alcohol	4	0.9%

Table 5. Physical marks observed in MAP-related inpatients (%) (2001)

	1999	2000	2001
Tattoos	25.1	33.1	18.5
Amputated finger joints	8.4	9.6	12.1
Scar of burning cigarette	18.4	22.3	13.7

Table 6. Seroprevalence of HIV and HCV among MAP-related inpatients (2001)

HIV Ab	0.3%	n=291
HBs Ag	0.3%	n=313
HBs Ab	3.9%	n=103
HCV	44.7%	n=313

Table 6 shows seroprevalence of HIV and HCV among methamphetamine-related inpatients. Last year, we detected the first HIV Ab positive drug abusers in our survey. He was a methamphetamine abuser, however, he had never experienced drug injection. Instead, he had always inhaled methamphetamine. His transmission route was heterosexual contact abroad.

In contrast with HIV, HCV infection is a serious problem in Japanese drug abusers. Figure 5 shows the percentage of HCV Ab positive patients. Forty-five percent of methamphetamine-related inpatients were HCV Ab positive.

Table 7 shows prevalence of HIV/HCV risk behaviors among methamphetamine-related inpatients. About 67% of them had experience of drug injection. About half of them had experience of needle or syringe sharing. These are the biggest routes of HCV infection.

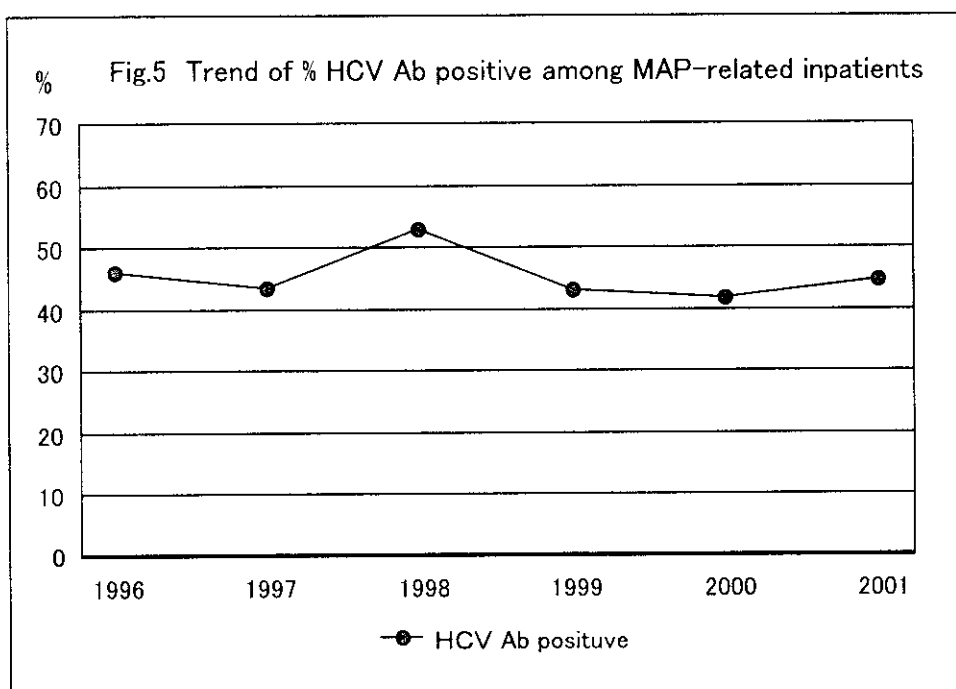


Table 7. Prevalence of HIV/HCV risk behaviors among MAP-related inpatients (2001)

	Lifetime	Past year
Injection	66.9%	58.1%
Syringe sharing	49.6%	35.8%
Needle sharing	48.0%	35.0%
Inhalation	59.6%	61.1%
Sexual contacts with commercial sex workers without condom		8.1%
Casual sex without condom		11.3%

This is one of topics. Methamphetamine has almost always been used by injection in Japan. However, how to use of methamphetamine is dramatically changing now. Inhalation is becoming more popular (Fig.6-1, 6-2). It's protective for infections, but inhalation has potential to promote casual abuse of methamphetamine. This is one of the issues we concern about.

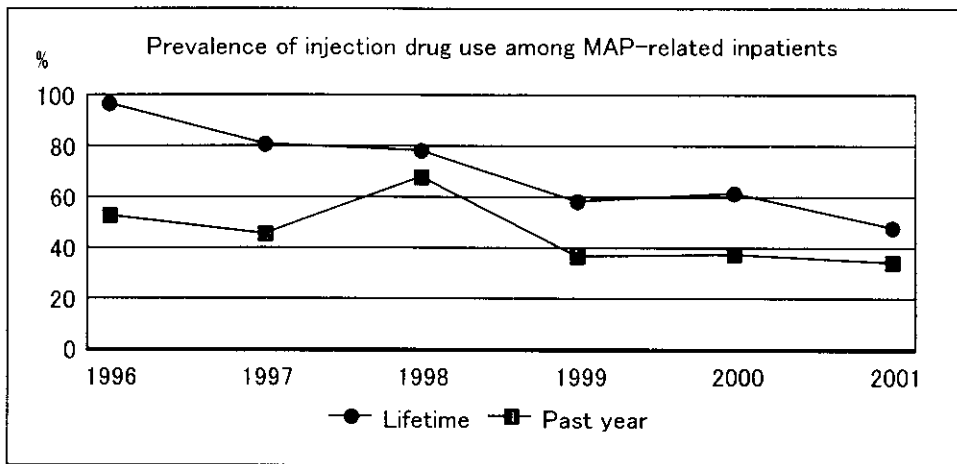


Figure 6-1

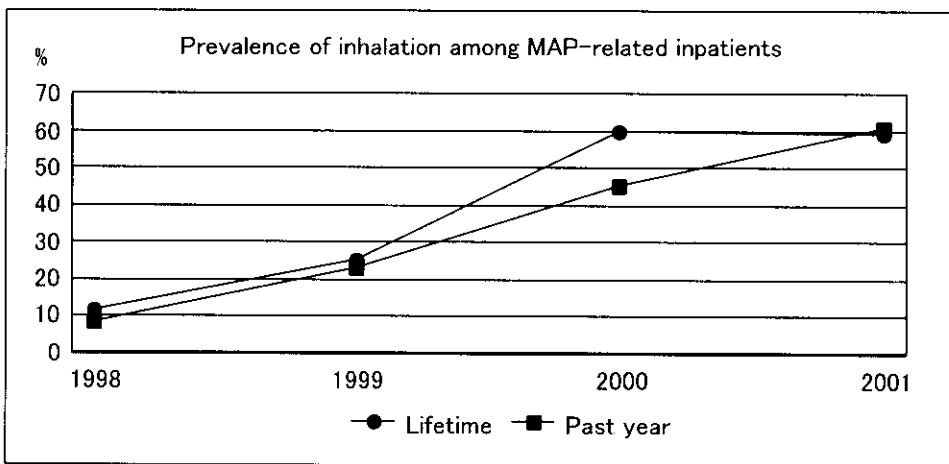


Figure 6-2

#### 4. Conclusion

In conclusion, there was almost no HIV positive among drug abusers in Japan. However, HCV infection is a serious problem for them. The main cause is to share needles and syringes for their injection drug use. Methamphetamine abusers seem to build an almost closed community in some kind of relationship with the “YAKUZA” society. For them, prevalence of injection drug use and sharing needles are high, however, the closeness of their community may prevent invading HIV infection from the outside and expanding HCV infection to the outside of the community. These situations may be due to the low seroprevalence of HIV in general population in Japan. If these speculations are correct, HIV could spread rapidly in the abusers’ community through injection, once HIV enters this community. Critical situation is continuing.

分担研究者 宮永 耕 東海大学保健科学部社会福祉学科

【1】 渡航先

サンフランシスコ（アメリカ合衆国）

【2】 渡航期間

平成14年11月3日～11月11日

【3】 渡航目的

昨年度研究で生活保護実施機関に対してヒアリング調査した国内で行われている薬物依存者を対象とする社会福祉行政並びに関連する非医療・非営利セクター等による援助の実践について、その課題を明らかにし、さらに今後の改善の方途を考察するために、米国・サンフランシスコ市における同様の薬物依存者を対象とする援助サービス・活動（プログラム及び組織的条件、システム等）の実態について、現地のソーシャルワーカー及び援助担当者の協力を得て見学し、研修することを目的とした。

【4】 渡航旅程

11/3 成田発－サンフランシスコ着

11/4 訪問機関名；

CSAS/Treatment Access Program

研修内容；Reiko Homma True, Ph.D のコーディネートにより、州、郡および市行政による薬物依存対策のシステム概略と援助関係諸機関についてオリエンテーションを受け、そのシステムの中心となるCSAS-TAPの定例会議に参加した。

11/5 訪問機関名；

Haight Ashbury Free Clinics, Inc.

Bill Pone Memorial Unit AYPS Program.

研修内容；SFCの中心部 Haight Ashbury 地区において地域で唯一の無料診療部門を併設した薬物依存者のケアユニットを訪問し、所長の Chang 氏より援助活動とアジア系利用者の抱える問題の概要について解説を受けた。

11/6 訪問機関名；

Ashbury House, Progress Foundation

研修内容；乳幼児を伴った女性薬物依存者の

入所ケアを行う Ashbury House のプログラムの特徴と運営について解説を受け、入所者の抱える問題の現状と援助課題について意見交換を行った。

11/7 訪問機関名；

Project ADAPT-Asian American  
Recovery Services, Inc.

研修内容；アジア系の薬物依存者に特化した治療プログラムを持つAARSの Intensive Outpatient Program について Program manager である W.Schultz 氏より解説を受け施設を見学した。また、スタッフによるグループセラピー実施後のセッションに参加し、併せて現在開発しているプログラムの説明を受け、議論した。

11/8 訪問機関名；

Adult Residential Facility-Walden  
House Inc.

研修内容；TCの理論に基づいた入所による薬物依存治療を行う Walden House の運営する成人施設のプログラムの概要と利用者ケアの考え方について、入所期からアフターケアまでの各段階別の処遇のポイントの解説を受け、施設見学を行った。

11/9 訪問機関名；

Client Adolescent Services  
-Walden House Inc.

研修内容；前日訪問研修した同セクターが13～19歳までの薬物依存児童を入所させてケアを行う Walden House 青少年プログラムについて、援助スタッフよりその概要説明を受け、質疑応答をとって対象児童のケアと施設運営の考え方等について議論した。

11/10 (11) サンフランシスコ発－成田着

【5】 まとめ

サンフランシスコ市における薬物依存者治療の基本的方針である“Treatment on Demand System”と呼ばれる今日のシステムについて、その成立以来の考え方について学ぶことができた。行政が多機関にわたる薬物関連問題のコー

ディネート機能を担い、予算措置を講じ、民間の多様なセクターが実践を通して把握した利用者ニーズに合わせた新しい専門援助・治療プログラムを開発し、援助実践を展開蓄積する中で、プログラム自体の質を確保し向上させてきたことが、各種の異なる状況に置かれた薬物依存者へアプローチする援助実践現場の専門職と市行政に長年携わってこられた Reiko.H.True,Ph.D による解説を通して理解することができた。

組織ではなくプログラムを重視したこの援助システムについては、わが国の特にこれまでその機能を重視されてこなかった社会福祉援助の役割についても視点を開き、わが国の今後の課題に関しても重要な示唆を与えるものと思われた。

(別掲6)

## 研究成果の刊行に関する一覧表

## 書籍

著者氏名	論文タイトル名	書籍全体 編集者名	書籍名	出版社 名	出版地	出版 年	ペー ジ
和田 清	青少年の薬物依存をめぐって	河合洋、 山登敬之	子どもの精神 障害	日本評 論社	東京	2002	175- 187
和田 清	26. 薬物乱用・依存・中 毒	山崎晃資、 牛島定信、 栗田 広、 青木省三	現代児童青年 精神医学	永井書 店	大阪	2002	335- 342
小沼杏坪、 尾崎 茂、 和田 清	各論 II 覚せい剤 覚 せい剤使用による精神 ・行動の障害	白倉克之、 樋口 進、 和田 清	アルコール・ 薬物関連障害 の診断・治療 ガイドライン	じほう	東京	2003	159- 185
和田 清、 内村直尚、 小沼杏坪	各論 II 有機溶剤 有 機溶剤使用による精神 ・行動の障害	白倉克之、 樋口 進、 和田 清	アルコール・ 薬物関連障害 の診断・治療 ガイドライン	じほう	東京	2003	189- 204

## 雑誌

発表者氏名	論文タイトル名	発表誌名	巻	ページ	出版年
Kiyoshi Wada	Prevalence of Solvent Inhalation among Junior High School Students in Japan and Their Background Lifestyle: Results of Chiba Prefecture Survey 1994.	Japanese Journal of Alcohol Studies & Drug Dependence	37	41-56	2002
和田 清、 菊池安希子、 尾崎米厚、 勝野真吾	青少年の薬物乱用—全国中学生 帖佐の結果より—	日本アルコール関連 問題学会雑誌	4	47-51	2002
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尾崎 茂	薬物依存症の最新の動向	月刊「精神科」	印刷中		
石橋正彦	薬物依存症の医療経済に関する 研究	九州神経精神医学	印刷中		

平成14年度厚生労働科学研究費補助金  
(医薬安全総合研究事業)

薬物乱用・依存等の実態把握に関する研究  
及び  
社会経済的損失に関する研究

研究報告書

主任研究者：和田 清（国立精神・神経センター 精神保健研究所）

2003年3月31日 発行