

Investigation of Direct Causes of Drug Relapse and Abstainers' Demands in a Compulsive Detoxification Center in Wuhan City of China¹

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Objective To identify the direct causes of drug relapse and abstainers' demand, and to develop programs for the prevention of drug relapse. **Methods** Abstainers in a Compulsive Detoxification Center in Wuhan City, capital of Hubei Province were randomly selected. An investigation on the direct causes of drug relapse and abstainers' demands was conducted with multiple-choice questionnaires and face to face interviews. Data were analyzed with SPSS 12.0. **Results** The direct causes leading to drug relapse included: temptation to use drug again by themselves or by their drug mates, seeking pleasure and ecstasy from drug use, relatively well off living, mental stress, irritation, demoralization, family conflicts, unemployment, feeling distrusted by the family, lack of care and love from the family, and discrimination by others. Abstainers' demands after detoxification and returning to the society included: care and support from the family, employment assistance, changing living environment, understanding by others, support from the society, and keeping far away from drugs. **Conclusions** Environmental factors are the direct causes of drug relapse, and negative irritation is its predisposing causes. Leaving former residence, more care and help given by both the family and the society and raising their overall quality of life are the demands of abstainers.

Key words: Drug abuse; Causes of drug relapse; Demands

INTRODUCTION

Drug abuse is a serious social and health problem, which causes great losses in economy, energy, and manpower resources. Now compulsive labor-education and voluntary detoxification are the main models of withdrawing from drugs in China. Although detoxification can reduce the consumption of drugs and may slow down the spread of drug abuse, the high relapse rate after withdrawal from drugs (above 95% after 6 months) remains a tough problem. The factors related to drug relapse are numerous. Previous investigations and experiments have shown that sensitivity to drugs and stress are the main causes of relapse. Relapse is associated, to a certain extent, with social factors and the quality of addicts^[1-5]. Elderly patients with more medical problems, depression, negative thoughts, lower educational, and occupational level, strong craving for heroin, inappropriate strategies used to cope with craving for drugs are the risk factors for relapse^[6-7]. Clients who

attempt to avoid a full relapse to heroin use consistently adopt cognitive strategy to avoid access to drug or distract their attention^[8]. However, reports are limited as to what leads to drug craving, and what the society can do to help them to keep away from drugs. Knowledge of the immediate causes of drug relapse and the abstainers' demands after returning to the society is of great significance in formulating interventions to prevent drug relapse and protocol of individual psychological therapy

MATERIALS AND METHODS

Subjects

Abstainers at a compulsive detoxification center in Wuhan, a provincial capital of Hubei in central China were randomly selected from 973 drug addicts for investigation with informed consent between July 16 and 18, 2002. The study was approved by the Institute Reviews Board in Tongji Medical College of

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Methods

Preliminary open-end investigations Sixty-two subjects were randomly selected from 8 wards of the detoxification center and interviewed on a voluntary basis. The aim and significance of the investigation were explained by the investigators to them, and three questions were raised (A. What stimulates your strong craving for drugs? B. What leads to your bad emotion and makes you use drugs again? C. What do you expect the society to do to prevent relapse?). The subjects were asked to speak out or/and write down their answers voluntarily with anonymity. When the answers were obtained, a lecture on the danger of drug abuse was given. After the lecture, the results of the first round investigations were announced and the subjects were asked to answer the same three questions again with reference to the results of their former answers.

Multiple choice questionnaires investigation Based on the open-end investigation results, a questionnaire with questions and multiple choices was worked out. The choices for direct causes of relapse included causes of great influence, causes of average influence and causes with little influence. Out of the 282 subjects, 259 agreed to accept the interview. Interviewers were medical assistant

professors with master degree and had been specially trained before the interview.

Data processing The data obtained in multiple-choice questionnaire investigation were input with Epidata software version 3.0 and processed with SPSS version 12.0. Descriptive statistical method and χ^2 -test were used.

RESULTS

Demographic Characteristics of the Subjects

Of the 282 addicts, 259 (91.84%) were interviewed, including 196 (75.68%) males and 63 (24.34%) females; 73.2% of them were under the age of 40 with low education, 20% of the male subjects and 35.33% of the female subjects had marriage failures (such as being divorced, widowed, and separated), 39.29% of the males and 31.75% of the females were of introvert personality or of partially introvert personality which were slightly higher than those of extrovert personality (27.55% of the males and 26.98% of the females). Only 35.71% of the males and 23.81% of the females were satisfied with their families, 28.06% of the males and 20.63% of the females were satisfied with their interpersonal relationship, 39.49% of the males and 41.27% of the females experienced tragic accidents in their earlier lives (Table 1).

TABLE 1

Demographic Characteristics of Subjects

Demographic Characteristics	Males		Females		χ^2	P
	n	%	n	%		
Age						
20-	64	32.65	27	43.55	3.17	0.205
30-	100	51.02	29	46.77		
40-	32	16.33	6	9.68		
Education						
Illiterate	2	1.03	0	0.00	-	0.670*
Elementary School	24	12.31	6	9.52		
Junior High School	115	58.97	39	61.90		
Senior High School	48	26.62	18	28.57		
Junior College	6	3.08	0	0.00		
Marriage						
Married	61	31.79	18	30.51	-	0.136*
Single	78	40.00	17	28.81		
Cohabit	16	8.21	4	6.78		
Divorced	33	16.92	14	23.73		
Spouse Died	2	1.03	3	5.08		
Separation	4	2.05	3	5.08		
Places of Family						
Countryside	11	5.61	2	3.17	-	0.821*

(to be continued)

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Demographic Characteristics	Males		Females		χ^2	P
	n	%	n	%		
Little Town	8	4.08	3	4.76		
Small or Middle City	20	10.20	8	12.70		
Large City	157	80.10	50	79.37		
Character						
Introvert	39	19.90	9	14.29	1.82	0.768
Partially Introvert	38	19.39	11	17.46		
In Between	65	33.16	26	41.27		
Partially Extrovert	18	9.18	6	9.52		
Extrovert	36	18.37	11	17.46		
Harmony of Family						
Harmony	56	28.57	17	26.98	1.68	0.431
In Between	110	56.12	32	50.79		
Lack of Harmony	30	16.31	14	22.22		
Satisfaction With Family						
Satisfaction	70	35.71	15	23.81	5.52	0.063
In Between	91	46.43	29	46.03		
Dissatisfaction	35	17.86	19	30.16		
Personal Relation						
Satisfaction	55	28.06	13	20.63	3.39	0.184
In Between	115	58.67	45	71.43		
Dissatisfaction	26	13.27	5	7.94		
Experienced Tragic Accidents						
Experienced	77	39.49	26	41.27	0.06	0.802
Never Experienced	118	60.51	37	58.73		

Note. *Fisher's exact.

Factors Stimulating Drug Craving and Relapse among Abstainers

Most drug abstainers (68.37% of the males and 66.67% of the females) were strongly influenced by drugs (64.80% of the males and 65.08% of the females were severely affected by drug). Impact of mental restlessness on the females (80.95%) was obviously severer than that on the males (53.57%) ($P=0.001$). Symptoms associated with drug addiction

were influencing the females (60.32%) also stronger than the males (45.41%) ($P=0.05$). Almost half of the males (47.96%) and more than 50% of the females (55.56%) were affected by drug-taking environment, but there was no significant difference ($P>0.05$). The proportions of males and females influenced by drug-taking hedonism were almost the same ($P>0.05$). More females (55.56%) were influenced by relatively well off living than males (42.86%) ($P<0.05$, Table 2).

TABLE 2

Causes Evoking Drug Craving

Causes	Sex	Great Influence		Average		No Influence		χ^2	P
		n	%	n	%	n	%		
Drug Mate	Male	134	68.37	39	19.90	23	11.73	1.34	0.51
	Female	42	66.67	16	25.40	5	7.94		
Mental Restlessness	Male	105	53.57	60	30.61	31	16.82	14.92	0.001
	Female	51	80.95	8	12.70	4	6.35		
Drug	Male	127	64.80	34	17.35	35	17.86	2.39	0.303
	Female	41	65.08	16	23.81	7	11.11		

(to be continued)

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Causes	Sex	Great Influence		Average		No Influence		χ^2	P
		n	%	n	%	n	%		
Drug-taking Environment	Male	94	47.96	54	27.55	64	32.65	3.96	0.158
	Female	35	55.56	17	26.98	11	17.46		
Syringe	Male	42	21.43	54	27.55	100	51.02	4.24	0.120
	Female	21	33.33	12	19.05	30	47.62		
Addictive Sufferings	Male	89	45.41	39	19.90	68	34.69	5.95	0.051
	Female	38	60.32	13	20.63	12	19.05		
Cigarette	Male	9	4.59	36	18.37	151	77.04	8.65	0.013
	Female	9	14.29	15	23.81	39	61.90		
Have Money	Male	84	42.86	48	24.49	64	32.65	9.46	0.009
	Female	35	55.56	20	31.75	8	12.70		
Drug-taking Hedonism	Male	92	46.94	52	26.53	52	26.53	4.36	0.113
	Female	32	50.79	22	34.92	9	14.29		
Stress	Male	59	30.10	71	36.22	66	33.67	4.07	0.13
	Female	25	40.32	24	38.71	13	20.63		
Family Conflict	Male	69	35.20	50	25.51	77	39.29	4.24	0.001
	Female	39	61.90	11	17.46	13	20.63		
Vacuity	Male	120	61.22	42	21.43	34	17.35	2.46	0.292
	Female	44	69.84	13	20.63	6	9.52		
Unemployment	Male	89	45.41	44	22.45	63	32.14	4.70	0.095
	Female	26	41.94	22	35.48	14	22.58		
Bad Personal Relation	Male	22	11.22	69	25.20	105	53.57	5.60	0.061
	Female	9	14.29	31	49.21	23	36.51		
Not Trusted by Family	Male	81	41.33	62	31.63	53	27.04	1.06	0.589
	Female	29	46.03	21	33.33	13	20.63		
Lack of Family Love and Care	Male	67	34.18	63	32.14	66	33.67	4.59	0.101
	Female	31	49.21	16	25.40	16	25.40		
Discrimination	Male	64	32.82	62	31.79	69	35.38	7.16	0.028
	Female	26	41.27	26	41.27	11	17.46		
Seeing Policemen	Male	45	23.08	48	24.62	102	52.31	0.206	0.902
	Female	15	23.81	17	26.98	31	49.21		

Factors Leading to Mental Stress, Irritancy, and Drug Taking Thirsty

Most males and females (69.84% and 61.22%) were greatly influenced by mental vacuity ($P>0.05$). More females (61.90%) were affected by family conflicts than males (35.20%) ($P=0.01$). The influence of unemployment, distrust by the family, lack of family care and love, discrimination by others and mental stress on both sexes was almost the same ($P>0.05$). However, these factors did lead to depression and drug-taking craving. About one fourth of the subjects reported that seeing the policemen was one of the factors leading to mental stress and drug thirsty, ($P>0.05$) (Table 2).

Demands After Withdrawal and Returning to the Society

The majority of withdrawers needed care and

love from the family, help with employment, change of living environment and understanding from the people around and leading a decent life. The differences between the males and females had no statistical significance ($P>0.05$). More females needed support from the society and keeping away from drugs than males ($P<0.05$) (Table 3).

DISCUSSION

The majority of abstainers investigated are young or middle-aged and have low education. They lack self-control and skills to cope with social relations or to relieve pressure from various sources. Their living environment is easy for them to meet the former drug mates and drug traffickers, or to have access to drugs, syringes and the like. Moreover, they are mentally sensitive to these factors^[9]. If the therapy to reduce

TABLE 3
Demands After Withdrawal and Returning to the Society

Demands	Sex	Necessary		Not Very Necessary		Unnecessary		χ^2	P
		n	%	n	%	n	%		
Family Love, Care, and Support	Male	172	87.76	7	3.57	17	8.67	1.74	0.419
	Female	59	93.65	1	1.59	3	4.76		
Help to Find Job	Male	148	75.51	17	8.67	31	15.82	3.66	0.161
	Female	53	84.13	6	9.52	4	6.35		
Keeping Away From Drug	Male	157	80.10	9	4.59	30	15.31	6.95	0.031
	Female	59	93.65	2	3.17	2	3.17		
Change of Living Environment	Male	147	75.00	19	9.69	30	15.31	4.77	0.092
	Female	53	84.13	7	11.11	3	4.76		
Being Understood	Male	132	68.04	27	13.92	35	18.04	5.15	0.076
	Female	50	79.37	9	14.29	4	6.35		
Getting Social Support	Male	123	62.76	27	13.78	46	23.47	12.13	0.002
	Female	54	85.71	5	7.94	4	6.35		
Keeping Away From Drug Mates	Male	162	82.65	10	5.10	24	12.24	8.11	0.017
	Female	61	96.83	1	1.59	1	1.59		
Leading A Decent Life	Male	160	82.05	12	6.16	23	11.79	5.19	0.075
	Female	59	93.65	2	3.17	2	3.17		
Getting Social Encouragement	Male	130	66.33	26	13.27	40	20.41	7.29	0.026
	Female	53	84.13	4	6.35	6	9.54		
Being Not Discriminated	Male	134	68.37	21	10.71	41	20.92	5.92	0.052
	Female	52	82.54	6	9.52	5	7.94		

their sensitivity is not provided during the period of detoxification, drug craving will be easily aroused, suggesting that desensitization therapy should be continued during this period. Drug-mates, temptation from the drug traffickers, memory of drug ecstasy, and the past drug-taking, sufferings brought by addiction, mental vacuity and unhappiness due to unemployment, mental stress and restlessness due to coldness of the family are likely to cause them to look for drugs in order to seek temporary mental relief. It is obvious that to help the abstainers to create stronger will and determination in the convalescence period is of prime importance for the prevention of drug relapse.

The abstainers wish to change their living environment, to keep away from drugs and their fellow drug users, and to receive care and support from the family and to gain the understanding by the people around them. They need encouragement and more education, as well as help in finding a job, leading a decent life, and keeping a vigorous mental status. Such demands are even stronger in the female abstainers. Therefore, we should not only help them, but also teach the family to correctly manage their relatives or friends who are drug users. Families do have the duty to keep the abstainers away from drugs,

drug-fellows, and drug traffickers.

Addiction brings enormous harms to drug users' families and the society. Most drug users' families are hurt both physically and mentally. The families' and society's distrust of and discrimination against them contribute to their own behaviors. Thus, we should help them to understand their family and return to a new life.

China is still in shortage of community social workers. If educational institutions offer courses related to sociology and train social workers to build up community's capacity to manage and address family conflicts in time, drug-taking and relapse would be prevented effectively. Drug relapse is closely associated with family's background, environment and the overall quality, educational and social relationship of the addicts. The community should make a comprehensive analysis of abstainers' conditions after leaving the detoxification center, work out a plan of assistance and education, and provide practical help. On the one hand, people should try their best to reduce the coldness and discrimination against the abstainers after they return to the society. On the other hand, the community should give them chance of receiving professional training and help them to find a job, and live a

passable life in order to reduce the relapse rate. Social workers in some developed countries, as well as Hong Kong and Macao in China have done much work to bring drug-taking and relapse under control^[10-11].

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