

Medicine beyond frontiers

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Drug Addiction

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It has been estimated that there are 2.7 million drug users in Thailand. Among these, 300,000 were drug addiction and only 170,000 requested treatment. Most drug users used various types of drugs and substances such as heroin, marijuana, CNS stimulants and alcohol. The extent of amphetamine type stimulants are increasing especially in young adolescents and students.

Amphetamine and derivatives are classified as CNS stimulant which have major pharmacological effects on dopaminergic transmission in CNS. Three major classes of amphetamine related substance can be found as classical amphetamine and amphetamine-like substance which enhance only dopaminergic neurotransmission, substituted/designer amphetamine which also enhances serotonergic neurotransmission and also acts as hallucinogens. The etiology of dependence are multifactor. Chronic use of amphetamine lead to the problems of abuse and dependence, which manifest as tolerance and withdrawal symptoms within the period of cessation of use. Other mental disorders may be found as delirium, psychosis, depression, mania, anxiety disorder, sexual dysfunction, sleep disorder. Standard pharmacological treatment is still not available, only some clinical trials on tricyclic antidepressant and SSRIs show inconsistent effectiveness in treatment retention or relapse prevention of amphetamine dependence. Hence, longterm comprehensive psychosocial rehabilitation program may be needed in treatment of amphetamine abstinence. Actually, the most effective treatment method is cognitive behavioral interventions, which is designed to modify the patient's thinking, expectancies and behaviors and to increase skills in coping with various life stressors.

The important strategy in drug addiction is prevention. Primary prevention can intervene by education and training. Family or parents participation will take a major role. School-based programs "life skill training" for students, counseling training for teachers, family focused programs, and community participation based programs, all are effective prevention for drug addiction.