Treatment of an obese opioid dependent with a single dose of 80 mg of buprenorphine: A new opening.

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ABSTRACT

Background: Opioid dependence is presently a proceeding problem.

Objective: To display the competency of a single dose of 80 mg of buprenorphine in the treatment of an obese opioid dependent patient.

Results: A single dose of 80 mg buprenorphine is very efficacious in the treatment of obese opioid dependents.

Discussions: The current study clarifies that a single dose of 80 mg of buprenorphine is very useful in the step-down and ending of opioids withdrawal symptoms.

Conclusions: We concluded that buprenorphine is an eminent medication for the treatment of opioid dependence. Therefore, this study is a substantial addition to the literature.

Key words: Buprenorphine; opioid dependence; obese patient

INTRODUCTION

There are three FDA approved medications (methadone, LAAM and buprenorphine) for the treatment of opioid dependence. Buprenorphine has been under intensive assessment for the remedy of dependency to opioids since the late 1970s (1, 2). Research studies and investigations from the United States, comparing buprenorphine with methadone for the treatment of opioid dependence, indicate the safety and efficacy of buprenorphine in comparison to methadone (2, 3, 4). Researchers like Johnson, Jaffe, and Fudala showed
that buprenorphine 8 mg per day was comparable to 60 mg of methadone considering opiate negative urine and retention rate (5).

Buprenorphine is a partial mu receptor agonist and has ceiling, hence its use is safe and has low possibility of overdose. As a new treatment, buprenorphine has less physical dependence than other opioids such as methadone. Buprenorphine is well absorbed when administered sublingually, reaching 60%–70% of the plasma concentration, but when applied orally its absorption is poor. Buprenorphine steps-down the incidence of HIV and other consequences of opioids abuse. Detoxification from buprenorphine is easier and faster than methadone (1, 6, 7).

Heroin is a potent opioid mu receptor agonist and is synthesized from opium. It was presented earlier as a non-addictive form of morphine (8). Opium has a long history of consumption for medical and recreational goals in different regions of the world (9, 10).

Nowadays, physical and psychiatric disorders are going up globally (11-29). Among mental health problems, substance affiliated disorders, especially opioids and psycho-stimulants connected disorders have been considered as advancing globally dilemma. Currently, opioids and psycho-stimulants related mental disorders are a developing problem and have caused more referrals to centers for outpatients and inpatients (30-102).

Buprenorphine has been approved by the FDA for the treatment of pain, and opioids withdrawal symptoms (8).

We are now applying a single dose of 80 mg of sublingual buprenorphine for the step-down and ending of opioids withdrawal symptoms and craving in an obese patient.

There are not substantial published papers on this topic, so, this study might disclose a new finding.

**Patient manifestation:**

We picture an obese patient weight 145 kg, with dependency to opioid who essentially answered to a single dose of 80 mg of buprenorphine.

MM was a single 41-years-old self employed with high school diploma education. His weight was 145 kg and his height was 191 cm. He lived with his parents in Darab city of Fars province in southern Iran.

MM began smoking tobacco and opium before age of 20 years. Then, stepwise started smoking of cannabis, methamphetamine and heroin.

He bit by bit developed anxiety, depression, suicidal thoughts, suicidal attempt, hallucinations and paranoid delusions since two years prior to admission.

Few months prior to admission he increased dosage of methadone, heroin and methamphetamine, then his psychiatric symptoms intensified.

Due to depression, suicidal thoughts, agitation, impulsive behaviors, hallucinations and delusions he was admitted in psychiatric ward.

During precise psychiatric interview and examinations he had suicidal thoughts, insomnia, depressed mood, agitation, paranoid delusions and hallucinations (auditory and visual). In medical and neurological examinations there are not any significant abnormal findings (we should mention that his weight and height were 140 kg and 191 cm, respectively).

Tests of serology for viral markers (HIV, HCV and HB Ag) were normal.
Urine drug screening tests were negative for morphine, methamphetamine, cannabis and benzodiazepines (patient’s relatives prevented him from any substance abuse since several days prior to admission). Based on comprehensive physical, psychiatric, and substance use history and also DSM-5 criteria MM was diagnosed as “methamphetamine induced psychotic disorder and opioid (methadone) dependence”. We administered aripiprazole 20 mg/d for treatment of psychosis, venlafaxine (ER) 225 mg/d for treatment of depression, chlorpromazine 100 mg/d and melatonin 6 mg/d for treatment of insomnia. On the first days of admission he reported opioid (methadone) withdrawal pain and craving, so we administered only a single dose of 80 mg of sublingual buprenorphine on the 4th day of admission. Base on the monitoring and interview (3 times a day) for opioid withdrawal pain and craving, MM reported a shortening level of pain and craving after administering a single dose of 80 mg buprenorphine. MM was discharged without any significant opioid withdrawal symptoms after two weeks of admission.

DISCUSSION

It appears that a single dose of buprenorphine may treat opioid withdrawal symptoms. Our current study illustrates that a single dose of 80 mg of buprenorphine is very efficacious in the step-down and ending of opioids withdrawalsymptoms. Hence, the current study is an affluent addition to the literature.

CONCLUSION

We assume that buprenorphine is an eminent medication for the treatment of opioid dependence. Buprenorphine looks to be much better than other drugs.

REFERENCES

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