

Methadone Maintenance Treatment (MMT):

Emerging the Challenges of the Opioid Epidemic

美沙冬維持療法：面對鴉片類藥物濫用的挑戰

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ABSTRACT

The opioid epidemic is a critical public health crisis that has afflicted nations worldwide. Methadone Maintenance Treatment (MMT) has appeared as a prominent strategy to combat opioid addiction and reduce associated harms. This report explores the mechanism of MMT, optimal dosage, social stigma, access barriers, and potential strategies for overcoming these challenges.

INTRODUCTION

Opioid addiction is not merely a personal struggle or conflict, but a complex and multifaceted brain disease that requires comprehensive and compassionate intervention strategies. The opioid epidemic has reached alarming proportions, claiming countless lives and causing immense societal and economic burdens.

MMT has emerged as a leading approach to addressing opioid addiction, offering a combination of pharmacological intervention and psychosocial support.

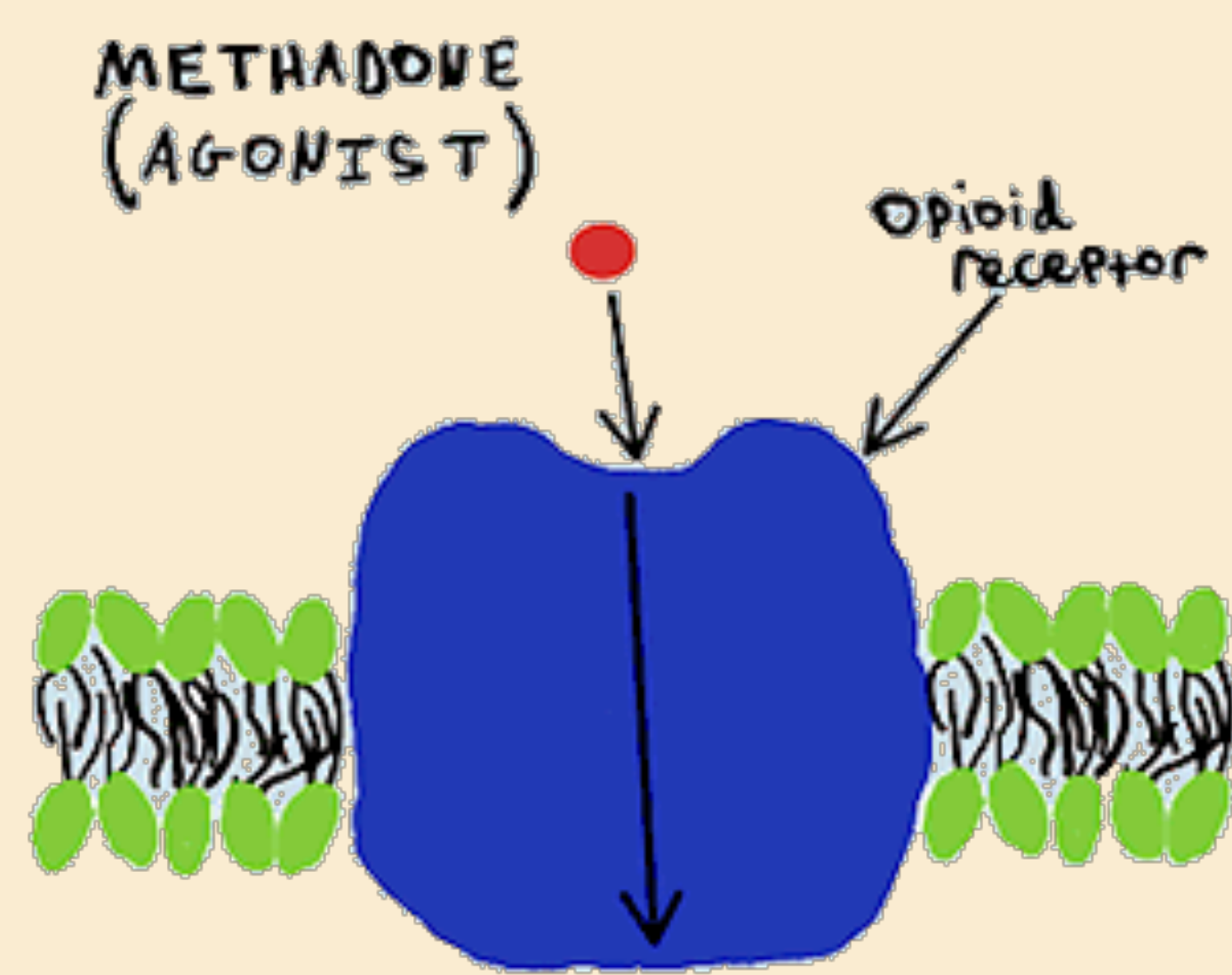
INDIVIDUALS at RISK for OPIOID ADDICTION

- ❖ Opioid addiction can affect individuals from various backgrounds and walks of life. It is not limited to any specific group of people, as factors contributing to addiction are multifactorial and can vary widely.
- ❖ Factors that can increase the vulnerability of individuals to opioid addiction:
 - Environmental factors
 - Trauma and mental health
 - Peer pressure
 - Lack of support networks
 - Socioeconomic factors

MECHANISM of MMT

MMT stabilizes individuals, allowing them to regain control over their lives and engage in productive activities. MMT can reduce the mortality rate of opioid substance users, and maintain a reasonable dose without harming the body, which is safe to be consumed by pregnant women and AIDS patients under intensive monitoring. MMT is not simply to relieve addiction, but it is also a therapeutic drug.

Methadone is a long-acting opioid agonist that binds to the same receptors as other opioids but in a controlled manner.



This helps alleviate withdrawal symptoms and cravings associated with opioid dependence, allowing individuals to stabilize and function without the need for frequent opioid use. By stabilizing their opioid use, individuals are better able to engage in meaningful activities such as work, education, and maintaining relationships.

As MMT helps reduce drug-seeking behavior, it can lead to a decrease in criminal activities associated with obtaining opioids illegally. MMT programs often offer additional services such as harm reduction education and access to clean needles. This can help decrease the risk of bloodborne infections such as HIV and hepatitis C, which are common among individuals who inject opioids.

FUTURE DIRECTIONS

Continuous monitoring and evaluation of MMT programs are crucial to gauge their impact and identify areas for improvement. MMT has emerged as a valuable tool in addressing the opioid epidemic. However, it is not without its challenges, including regulatory hurdles, social stigma, access barriers, and the need for comprehensive support services. Overcoming these challenges requires a concerted effort from healthcare providers, policymakers, communities, and individuals to create an environment where effective treatment is accessible and destigmatized.

OPTIMAL METHADONE DOSAGE

- ❖ The optimal dosage for Methadone varies from person to person and is determined by healthcare professionals based on factors such as the severity of opioid addiction, individual response to the medication, and potential interactions with other substances or medications.
- ❖ When the dose of Methadone is above 60 mg, the negative rate of heroin injection in the past six months is significantly lower. The higher the dose of Methadone, the better the treatment effect.
- ❖ Reasonable dose of Methadone is 60-120mg with up to 10-14 years of tracking and does not cause organ damage, which can be used by pregnant women under intensive monitoring.
- ❖ Common side effects of Methadone: constipation, insomnia, drowsiness.

DURATION of MMT

For some individuals, MMT can indeed be a lifelong treatment, especially for those who have experienced chronic opioid addiction and have not been able to achieve sustained abstinence from opioid use. These individuals might benefit from ongoing Methadone maintenance to maintain stability and prevent relapse. However, not all individuals on MMT will remain on it indefinitely.

- ❖ Regular assessments by healthcare professionals are crucial in determining the appropriate treatment duration.
- ❖ Some individuals might use MMT as a stepping stone towards recovery, gradually reducing their Methadone dose under medical supervision to eventually discontinue the medication.

- ❖ The duration of MMT should be individualized based on factors such as:
 - the severity of addiction
 - the presence of co-occurring disorders
 - the person's readiness for change
 - the availability of comprehensive support services

- ❖ The primary objective is to provide effective treatment, reduce the harms associated with opioid addiction, and support individuals in their journey toward recovery.

SOCIAL STIGMA of MMT

Misconceptions about Methadone as a "substitute addiction" rather than a treatment can deter individuals from seeking help. The association of Methadone and criminality and illicit drug use also contributes to a hostile environment for seeking help. Fear of judgment can also lead to reluctance in disclosing participation in MMT. Public awareness and education are vital to address these perceptions and promote understanding. Many patients actually take the medicine without even telling their family members.

The stigma surrounding MMT is a complex issue rooted in misconceptions, moral judgment, and societal attitudes toward addiction. Addressing this stigma is vital to ensure that individuals seeking help for opioid addiction can access effective treatment without fear of judgment or discrimination.

ACCESS BARRIERS

Geographical disparities, financial constraints, and a shortage of treatment facilities can prevent individuals from accessing this critical intervention. Successful recovery from opioid addiction requires more than just pharmacological treatment. Comprehensive services such as counseling, mental health support, vocational training, and housing assistance are essential components of MMT's effectiveness. However, ensuring the availability and integration of these services can be logistically complex.

- ❖ Multi-pronged approach needed to tackle these challenges:
 - Conducting targeted awareness campaigns to combat stigma.
 - Investing in expanding treatment infrastructure.
 - Integrating technology for enhanced access and monitoring.
 - Revising regulations for accessibility and diversion prevention.