CDUHR RESEARCH FOR IMPLEMENTATION

BRIFF #5

Medication-Assisted Treatment for Opioid Use Disorder

WHAT IS MEDICATION-ASSISTED TREATMENT?

Medication-assisted treatment (MAT) refers to the use of medications in the treatment of substance use disorders (SUDs). A conceptual starting point for MAT is understanding that SUDs are chronic, relapsing conditions that are the result of multiple factors including genetic, psychological, and environmental causes, and not an indication of moral weakness or a lack of willpower. As with other chronic conditions, the treatment of SUDs may include a wide variety of methods, including counseling and lifestyle changes, combined with MAT. And as with other chronic diseases, the goal of treatment is to improve the health of affected individuals and their ability to manage the disease.

WHY HAS THERE BEEN INCREASED ATTENTION TO MAT?

The US is in the midst of an epidemic of opioid misuse and overdose deaths.¹ This crisis has also been linked to increases in HIV and hepatitis C virus (HCV) infections.^{2, 3} MAT is available to treat opioid use disorders^a, and has been recognized as a critical component in the response to the opioid epidemic. MAT for opioid use disorders uses drugs to stabilize brain chemistry, reduce or block the euphoric effects of opioids, relieve physiological cravings, and normalize body functions.⁴

EVIDENCE FOR EFFECTIVENESS

At present, there is extensive compelling evidence for the effectiveness of two medications – methadone and buprenorphine – for the treatment of opioid use disorders. Methadone and buprenorphine have been shown to greatly reduce heroin use and injection, and the associated risks of bacterial and viral infections such as HIV, HCV, skin abscesses and endocarditis. They have also been shown to increase retention in SUDs treatment (as compared to treatment without medication), to improve social and psychological functioning,⁵⁻⁷ and there is some evidence that they can decrease the incidence of overdose.8 Evidence for the effectiveness of these two medications is sufficiently strong that they are included in the World Health Organization Model List of Essential Medicines. Innovative methods to enhance engagement in buprenorphine treatment have shown success, including initiating buprenorphine in emergency departments¹⁰ and with the use of telemedicine, which can be helpful in providing MAT in rural communities. 11 There is also evidence for the effectiveness of a third medication in the treatment of opioid use disorder, injectable extended release Naltrexone (XR-naltrexone). Lower rates of treatment initiation have been observed in studies of XR-naltrexone, but there are indications that it is as effective in preventing relapse as buprenorphine for those patients who initiate treatment. 12, 13

BARRIERS TO IMPLEMENTATION

MAT for opioid use disorders suffers from severe social stigmatization and over-regulation, and MAT is incorrectly considered by some as merely substituting one drug for another. Stigma reduces support for MAT programs in some communities and there is great geographic variability in MAT access across the US. In rural areas heavily impacted by the opioid epidemic, MAT programs are scarce. In addition, access to MAT is limited for some groups with opioid use disorders, including adolescents¹⁴ and populations in criminal justice settings.¹⁵ Moreover, in some settings MAT is not implemented in accordance with research evidence and clinical guidelines, with the result that fewer are retained in treatment or achieve the benefits of improved social functioning and better overall health. Low retention in treatment is often a consequence of stigmatizing participants, providing lower than recommended dosages, and creating high thresholds for accessing and remaining in treatment.^{16,17}

RECOMMENDATIONS FOR MAT

- 1. All persons with opioid use disorder should be able to access methadone or buprenorphine treatment.
- 2. The expanded implementation of MAT should occur with efforts to ensure quality and accessibility of programs (e.g., provision of adequate doses, easily accessed programs, sufficient funding).
- 3. "Combination" program efforts should be implemented to counter prescription opioid misuse consequences, including overdose prevention programs.
- **4.** MAT should be provided in a context where counseling and other support services are available.
- 5. Reducing the stigma associated with SUDs and MAT is a major challenge. The implementation of MAT would be greatly facilitated by large-scale, community-wide efforts undertaken to reduce this stigmatization.

^aOpioids include natural opiates (e.g., heroin, morphine) and synthetic drugs (e.g., fentanyl and prescription pain pills such as oxycodone, hydrocodone, codeine, and others).

COMBINATION APPROACHES

MAT has been combined with other interventions to reduce the negative consequences of opioid use disorder. These interventions include reducing access to prescription opioids, overdose prevention and rescue programs, access to sterile injection equipment through needle/syringe programs, and outreach and education to those at risk of opioid misuse.¹⁸ It has been found that these types of combination approaches are more effective than single-effort approaches to address drug misuse-related epidemics.¹⁹

For further information on this Brief contact CDUHR at CDUHR.nursing@nyu.edu.

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