Comprehensive Opioid Medication Assisted Treatment Program

Resource Guide

According to the Centers for Disease Control and Prevention, Illinois' statewide average drug poisoning death rate has risen from 10 per 100,000 in population to 13.1 between 2010 and 2014. In 2014, the national average drug poisoning death rate was 14.7 per 100,000, and ten Illinois Counties reported rates exceeding 15 per 100,000.

Illinois' treatment admission rates are significantly higher than U.S. rates. In 2012, heroin accounted for 16 percent of U.S. treatment admissions but fully 25 percent of Illinois admissions. (Kane-Willis et al., 2015). Heroin treatment admission numbers have climbed in urban, suburban and rural areas across the state with some areas seeing increases of more than 100% between 2007 and 2012 to 16 percent and 13 percent, respectively. (Kane-Willis et al, 2015).

While Illinois heroin use has increased dramatically, the state's capacity to treat heroin addiction has declined. In 2012, Illinois ranked 1st in the nation for decline in heroin treatment admissions, reducing availability 52 percent and ranked 44th out of 46 states for treatment funding (Kane-Willis et al, 2015). State funding for addiction treatment decreased by 30 percent from 2007 and 2012 and proposed 2016 funding would decrease by 61 percent (Kane-Willis et al, 2015).

Although methadone has been the popular drug choice for Medication Maintenance Therapy (MMT), buprenorphine use in clinics has increased over the past decade (Turner, Kruszewski, & Alexander, 2015). Approved for MMT use in 2002 by the Food and Drug Administration, buprenorphine is a synthetic opioid. It is administered along with naloxone (an overdose reversal drug) in order to reduce risk of abuse and addiction. The drug's effects stop increasing after reaching a certain dosage unlike heroin and methadone. There are also fewer and less severe withdrawal symptoms for buprenorphine at low doses. As buprenorphine costs more to administer and it is covered by insurance less often than methadone, it is used less in clinics (Wechsberg & Kasten, 2007).

Vivitrol, also known as naltrexone, is an opioid antagonist that blocks the receptors that are triggered by heroin and obstructs the feeling of pleasure that heroin causes (Syed & Keating, 2013). Vivitrol is administered through a shot by a healthcare professional. The effects last for a month and it cannot be removed from the body after injection. Users must detox from heroin and other opioids for seven to ten days before receiving a shot. Unlike methadone and buprenorphine, it is not addictive (Syed & Keating, 2013). There is no withdrawal from Vivitrol after treatment stops. It can be used as a short- or long-term prevention method for substance use. Vivitrol is most effective when administered along with drug counseling.

Opioid users are more likely to complete residential treatment than outpatient therapy (Millar et al., 2014). One study found a 65 percent program completion rate for residential drug recovery programs compared to 52 percent for outpatient programs (Stahler, Mennis, & DuCette, 2016). After controlling for demographic factors, residential program clients were three times more likely to complete a program than outpatient clients. The likelihood of residential program completion was even higher for opioid abusers. Substance abusers entering residential programs

tend to be more motivated to change compared to in outpatient treatment (Millar et al., 2014). Researchers theorize that residential treatment provides clients protection from substance use triggers in their environment that can lead to relapse during treatment (Stahler, Mennis, & DuCette, 2016).

Residential care facilities that offer aftercare for clients upon release have been shown to yield better outcomes. Aftercare has been measured to reduce drug use, reduce relapse, and increase use of drug abstinence counseling (Arbour, Hambley, & Ho, 2011; Sannibale et al., 2003). In a government report that analyzed four residential care facilities in the United Kingdom, researchers provided best practices for positive outcomes after release. The report found that aftercare support should be planned throughout the client's treatment (Khan, Briggs, Rees-Jones, Thompson, & Owens, 2005) and that stable housing was a critical factor in post-treatment success.

There has been limited research on maintenance therapy in U.S. prisons and jails. Riker's Island jail in New York has a long running methadone/ buprenorphine therapy program since 1986 called The Key Extended Entry Program (KEEP) (Tomasino, Swanson, Nolan, & Shuman, 2001). The program administers methadone therapy to about 4,000 inmates a year. Methadone is administered by pill under the supervision of a nurse and a correctional officer. KEEP participants receive counseling along with methadone. They also receive education on HIV treatment and relapse prevention counseling. Some KEEP clients have the opportunity to be transferred to a therapeutic community in lieu of serving their sentence out in prison. KEEP participants are likely to attend post-release treatment (74-80 percent). Eighty percent of participants returned to prison once or not at all after treatment (Tomasino, Swanson, Nolan, & Shuman, 2001). Another study on KEEP has shown that inmates on moderate and higher doses of methadone versus lower doses attended post-release services more (Harris et al., 2012). Another study compared buprenorphine to methadone therapy for KEEP participants, and found that buprenorphine treatment resulted in higher inmate satisfaction with treatment side effects and higher intention to enroll in post-release treatment (93 percent versus 44 percent) (Awgu, Magura, & Rosenblum, 2010).

A study of 211 Maryland prison inmates measured the effects of addiction counseling and maintenance therapy with buprenorphine and naloxone, a heroin overdose reversal drug (Gordon et al., 2014). The 12-week program featured relapse prevention, overdose prevention, and job and housing case management. Some inmates received counseling and buprenorphine and naloxone maintenance treatment provided by an external certified treatment organization and some received counseling alone. More inmates entered addiction counseling upon release from the maintenance therapy group (48 percent) than the counseling-only group (22 percent) (Gordon et al., 2014).

Another study of 375 male inmates found in-prison treatment did not reduce recidivism for drug crimes, however, inmates receiving maintenance therapy after release were 20 percent less likely to be re-incarcerated for all types of crimes (Larney, Toson, Burns, & Dolan, 2012). A review of the opiate replacement therapy research reveals that four out of five studies found significant

reduction in heroin use after release and significantly less prison infractions for drug use (Hedrich et al., 2011).

Vivitrol has the potential to change perceptions of maintenance therapy for prison populations due to the fact that it is an antagonist rather than an opioid. In a recent study, pre-release Maryland prisoners were given Vivitrol once before release and once per month for the six subsequent months in the community. Out of 27 participants, 10 completed treatment. One hundred percent of the participants who received fewer than the total seven injections tested positive for opioids compared to only 38 percent of participants who received all injections (Gordon et al., 2015). A similar study conducted in New York administered two doses of Vivitrol to 15 participants. Participants on Vivitrol were found to be 30 percent more likely to test negative for opioids compared to a control group at four weeks post release, and 35 percent more likely at eight weeks (Lee et al., 2015). Maintenance therapy programs are being piloted in more states including Rhode Island, Pennsylvania, Maryland, Connecticut, New Mexico, Massachusetts, Florida, and Puerto Rico (Miller, 2013).

In a recent study examining the fidelity to the evidence-based Adult Redeploy Illinois service model, researchers made the following recommendations for community-based service program for justice involved persons (Reichert, et al., 2016):

- Target high risk offenders
- Offer comprehensive services
- Employ small caseloads
- Provide staff training on evidence-based practices
- Conduct strategic drug testing

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