Massachusetts Consultation Service
MCSTAP
for Treatment of Addiction and Pain

MCSTAP Learning Case: Tapering a Patient on a High Dose of Adderall

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Brief Description of Clinical Case

This patient has been on a high dose of Adderall (75 mg) for over 10 years for diagnosis of attention disorder. He has never been monitored and is getting q3 months Rx. His prior prescriber retired, and his new provider begins monitoring with urine drug testing. The patient has had three cocaine-positive tox screens in a row. His provider calls for guidance on how to taper the Adderall, in the setting of cocaine use.

Medications

Adderall 75 mg

Caller Questions

1. What comfort meds are recommended for a patient who will come off a prescribed stimulant (e.g., Adderall)?
2. What taper plan is recommended?

Treatment Plan

1. Bring the patient in to assess for stimulant use disorder and review risks of combining prescribed and illicit stimulants.
2. If the patient endorses casual use of cocaine or other stimulants without identified use disorder, discuss with him in person that as his clinician you can only prescribe if he is able to maintain abstinence as demonstrated with appropriate toxicology and increased monitoring (e.g., weekly Rx and toxicology). Otherwise, the risk is too high.
3. If the patient is determined to have a stimulant use disorder, then refer him to detoxification and further long-term SUD outpatient treatment, including behavioral treatment.
4. Comfort medications are not generally indicated for coming off prescribed stimulant medications (see below for SAMHSA tips).

Learning Points

1. Adderall is a Schedule II controlled substance with risk of dependence and misuse/abuse potential. It is recommended that doctors monitor patients on prescribed stimulants with drug testing, as this physician did. The test results should lead to a conversation about the safety of combining prescribed stimulant medications with cocaine or other stimulant drugs and an assessment of the severity of the patient's potential stimulant use disorder. Identifying the use pattern, frequency and amount of illicit stimulant can guide treatment recommendations. Sharing one's concern for the patient's health and safety considerations as a prescriber is important, including that it is not safe to continue prescribing stimulants with ongoing cocaine use and that a shift in type and intensity of treatment is needed.
   (For video examples of how to discuss positive Toxicology see Scope of Pain - (scopeofpain.org). Free registration & Login required.)

https://www.scopeofpain.org/core-curriculum/online-training/

2. **Is there a withdrawal syndrome?** Maybe; there is limited medical literature on the withdrawal effects of long-term prescribed stimulants.
3. **What symptoms can be experienced during stimulant withdrawal?** Although there is limited evidence, these symptoms include: depression, hypersomnia (or insomnia), fatigue, anxiety, irritability, poor concentration, psychomotor retardation, increased appetite, paranoia, and drug craving. https://store.samhsa.gov/system/files/sma15-4131.pdf
4. **How should stimulant withdrawal be managed?** Mechanistically, there is concern that withdrawing the stimulant abruptly could lead to dysphoria and depressive symptoms in setting of reduction in dopamine, similar to what is seen in cocaine and methamphetamine use disorders. Based on the literature on cocaine and methamphetamine from SAMSHA, "there are no medications with proven efficacy to treat stimulant withdrawal. The most effective means of treating stimulant withdrawal involves establishing a period of abstinence from these agents. Patients undergoing withdrawal from cocaine or amphetamines report insomnia and may benefit from diphenhydramine (Benadryl) 50 to 100 mg, trazodone (Desyrel) 75 to 200 mg, or hydroxyzine (Vistaril) 25 to 50 mg at bedtime. Benzodiazepines should be avoided unless required for concomitant alcohol or sedative detoxification. As stimulant withdrawal symptoms wane, patients are best treated with an active rehabilitative approach that combines entry into substance use disorder treatment with support, education, and changes in lifestyle. Antidepressants, such as selective serotonin reuptake inhibitors, can be prescribed for the depression that often accompanies methamphetamine or other amphetamine withdrawal." (SAMHSA)
5. **Is taper of Adderall appropriate?** If someone is actively using cocaine, it is not safe to continue prescribing Adderall. If, after discussing this with the patient regarding his/her use pattern and adequate evidence that the patient is unable to stop cocaine use, and the diagnosis of active stimulant use disorder is most likely, then continued prescribing is not safe and should be discontinued. The clinician should consider transitioning the patient to a safer ADHD medication for future treatment. People with ADHD have higher rates of concomitant substance use disorders than those without ADHD. However, treatment of ADHD with medications has **not** been shown to increase risk of SUD and in some studies has shown some improvement in SUD and related outcomes (Zulauf). Untreated, ADHD can worsen SUD. If the patient is able to maintain abstinence from illicit stimulants, it is not unreasonable to continue treatment for ADHD with close monitoring (e.g., shorter prescriptions, frequent drug testing). However, if the patient is unable to remain abstinent from illicit stimulants, it is recommended that the clinician refer the patient to an SUD expert to evaluate the patient and consider a less-risky medication to treat the underlying ADHD. One concern that often arises when considering tapers is whether abrupt discontinuation of ADHD treatment might increase severity of the patient's stimulant use and/or use disorder. There is no adequate literature to guide this important question, but it remains a consideration. To avoid abandoning the patient, the following the options should be considered: offering an alternative treatment for his/her ADHD; linkage to treatment of his/her stimulant use disorder; and removing the patient from the triggering situation. MCSTAP can help with resources if needed for higher level of care.

1. Zulauf et al. The Complicated Relationship Between Attention Deficit/Hyperactivity Disorder and Substance Use Disorders. Curr Psychiatry Rep. 2014 Mar; 16(3): 436
2. Treatment Improvement Protocol (TIP) Series, No. 45. Chapter 4: Physical Detoxification Services for Withdrawal from Specific Substances. Center for Substance Abuse Treatment. Rockville (MD): Substance Abuse and Mental Health Services Administration (US); 2006.https://www.ncbi.nlm.nih.gov/books/NBK64116/