### Periodic Table of the Intoxicants

At the heart of all rewarding experiences, whether natural or drug-induced, lies the brain neurotransmitter **dopamine**. Dopamine helps us attend to, learn, and then predict rewards that are important for survival by enabling a very specific but crucial component of reward known as **incentive salience**. So dopamine is more of a chemical of "wanting" than it is "pleasure," or "liking." To create a full pleasurable experience, the brain uses chemicals besides dopamine such as glutamate, GABA, endogenous opioids, and endocannabinoids. Nevertheless, certain drugs and behaviors are addictive because they cause inappropriately large and fast increases in dopamine signaling that overwhelm the normal reward-learning process and give that drug or behavior greater value than more functional behaviors.

We can arrange all dopamine-releasing drugs and behaviors into a "Periodic Table" much the way chemists do with elements - by their class, structure, and properties. The drugs and behaviors below are arranged by their categories (rows) and potency, abusability, or harm (left to right). A person with a problem with a drug or behavior in one category may develop a problem with any of the other drugs or behaviors on the table. Use of that drug or behavior (or even exposure to associated stimuli) may cause relapse to the original drug of choice. This is the phenomenon of **cross-addiction**.

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**Controlled Substances Act (1970) Schedules:**
- **CI** - drug has a high potential for abuse and dependency and no accepted legitimate medical use; unsafe and illegal for prescription, use, and/or possession
- **CII** - drug has a significant potential for abuse and dependency but accepted medical use; strictly restricted prescribing and possession
- **CIII** - drug has a significant potential for abuse and dependency but accepted medical use; restrictions on prescribing and possession
- **CIV** - lower potential for abuse and dependency relative to CII; accepted medical use; prescribing and possession restrictions apply
- **CV** - lowest potential for abuse and dependency relative to CIV; accepted medical use; restrictions apply

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<table>
<thead>
<tr>
<th>SEDATIVE/HYPNOTIC</th>
<th>MAJOR STIMULANT</th>
<th>MINOR STIMULANTS</th>
<th>CANNABINOIDS</th>
<th>ENTHEOGENS</th>
<th>DISSOCIANTS</th>
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