

## **Abstract: Kenneth R. Alper**

### **Title of Presentation:**

### **Ibogaine's mechanism of action remains unknown: Integrating the observations of treatment providers and research scientists**

Abstract: Scientific interest in ibogaine as an approach to reducing tolerance to opiate medications used to control pain dates back to the 1956 with work done at Ciba Pharmaceutical Corporation and its use in addiction began with Howard Lotsof's commissioning of the Clouet report in 1984. Over time, a number of theories regarding ibogaine's mechanisms of action have been suggested. None of these theories adequately explain ibogaine's mechanism of action. In approximate historical order of appearance these theories include:

1. Increased opiate effects due to acetylcholine
2. Placebo
3. Antagonism of the NMDA type receptor of the excitatory neurotransmitter glutamate
4. Agonist activity at the kappa type opioid receptor
5. Hallucinogenic effects attributed to an action like that of classical hallucinogens such as LSD, mescaline or psilocybin
6. A direct opioid agonist effect like that of methadone, coupled with slow release of ibogaine from body fat and a long lived metabolite
7. Positive mood states following treatment attributed to a Prozac-like antidepressant effect
8. Increased expression of glial derived neurotrophic factor (GDNF)

## 9. Effects at the level of basic cellular energy metabolism

Emphasis will be given to the observations of treatment providers, that in fact provide evidence relating to many of the above theories but which are often overlooked in scientific publications.