The automatic predictors of the attentional bias toward the alcohol: Do we want it or like it?

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The incentive sensitization theory of addiction claims that repetitive drug consumption sensitized the mesocorticolymbic system that is responsible for attributing the incentive salience to the drug. During the sensitization the drug and drug-related stimuli become more attention grabbing for the addicted person, increasing the probability to seek and take the drug (Robinson and Berridge, 2001). In the present work we tried to identify the automatic processes that underlie this attentional bias toward the drug and drug-related stimuli in the case of alcohol addiction. In particular, we suggest that two factors could predict the attentional bias toward the alcohol-related stimuli. The first factor is the self-relevance of the alcohol (drug ‘wanting’), namely the automatic association between the concept of self and the alcohol. The second factor is the evaluation of the alcohol and alcohol-related stimuli (drug ‘liking’), that is the automatic association between the alcohol and positive or negative valence. Both predictors were assessed with the implicit association task. The attentional bias toward alcohol-related stimuli was assessed with the visual dot probe task. Three studies were conducted with similar procedure but with different groups of participants. Study 1: individuals that had a clinical condition of alcohol addiction in the past but were in abstinence at the time; Study 2: a group of university students that were moderated drinkers; Study 3: a group of alcohol dependent individuals at the beginning of their treatment. Meta-analyses showed that only the self-relevance of the alcohol (‘wanting’) predicted the attentional bias toward the alcohol-related stimuli (effect size = .66, p = .01), but not the evaluation of the alcohol stimuli (effect size = .3, p = .26). This result is in line with the incentive sensitization theory of addiction that indicates the ‘wanting’, but not the ‘liking’, as a key feature of the process of addiction.