

Psychological assessment in pathological gamblers treated with escitalopram

E. Picone[1], G. Maniaci[2], T. Dimarco[3], A. Brancato[2], F. Plescia[4], C. Cannizzaro[4]

[1] UOS Sert Montelepre, CeDiSS, ASP Palermo

[2] PhD Neuroscience and Behavioral Disorders, University of Palermo (BioNeC, University of Palermo)

[3] Dept. Pathological Addiction, ASP Palermo

[4] Dept. of Sciences for Health Promotion and Maternal Care 'G. D'Alessandro', University of Palermo

BACKGROUND: Pathological Gambling (PG) is classified as a "Disorder of Impulse Control", but due to similarities with drug addiction is frequently described as a drug-free addiction (Potenza et al., 2012). PG is conceptualized as a behavioural addiction because of its neurobiologic, neurophysiologic and psychological features. Current therapeutical approaches seem unsatisfactory as they do not achieve definitive positive outcomes. Considering the well known psychopathological comorbidities, PG represents both a social (impact on relatives money/life) and a sanitary cost, in terms of pharmacological and psychological support. The compulsive behaviour detectable in PG, is a disease with neurophysiopathological basis now fairly well-defined which affects particularly vulnerable people. PG is linked to important changes in brain systems such as the prefrontal cortex, the nucleus accumbens, the endogenous opioid system and the extended amygdale. Recent fMRI studies associate PG with blunted mesolimbic activation to non-specific rewards, whereas increased prefrontal cortex, anterior cingulate and ventral striatum activation is observed during gambling-related cue-exposure paradigms. Several neuropsychological studies show higher impulsivity in PG (Odlaug BL. et al., 2013) that, together with specific psychopathological symptoms, such as anxiety and depressed mood, characterize different PG subtypes (Blaszczynski A, Nower L. 2002). Impulsivity transcends multiple psychiatric disorders and is thought to be central to impulse control disorders such as PG. Furthermore, many PGs suffers from depression and decreased mood. **AIM:** The aim of this study is to prove the efficacy of escitalopram in PG particularly with regard to impulsivity and depressive mood. **METHOD:** Ten PGs naive were early assessed through psychological tests including South Oaks Gambling Screen (SOGS), Beck Depression Inventory (BDI-II) and Barratt Impulsiveness Scale (BIS-11). Then, the PGs were administered escitalopram in an open-label fashion for up to 12 weeks. Subjects were rated at baseline and at 4-week intervals on measures of gambling severity and depression, and at 3-month intervals on impulsiveness. **RESULTS:** Patients reported significant improvements on all gambling measures including the number of days gambled, the amount of money lost gambling, preoccupation with gambling, and urgency to gamble. Furthermore, improvements in depression and impulsiveness were outlined, together with significant improvements in both sub-scales of BDI-II that measured the 'Affective' and 'Physical' component of depression. **CONCLUSION:** Treatment with SSRI, such as Escitalopram, may be an effective therapeutical tool for pathological gambling. Well-defined and controlled clinical trials in large samples of PGs are needed.

• Odlaug BL. et al., *Curr Opin Psychiatry*. 2013;26(1):107-12

• Blaszczynski A, Nower L. *Addiction*. 2002;97(5):487-99

• Potenza et al., 2012 *Psychoph* 219(2):469-490