

S38-02 - RECREATIONAL MDMA 'ECSTASY': PSYCHIATRIC ASPECTS AND THE DIATHESIS STRESS MODEL

A. Parrott

Psychology, Swansea University, Swansea, UK

Introduction: MDMA/Ecstasy is associated with a range of psychiatric disorders. There is debate over this is caused by drug usage, or reflect pre-existing premorbid characteristics.

Aims and objectives: To examine how the diathesis-stress model can explain the patterns of psychiatric distress observed in recreational Ecstasy/MDMA users.

Methods: The empirical literature on psychiatric problems in MDMA users will be reviewed.

Results: Numerous empirical studies have found significantly raised psychiatric profiles in recreational Ecstasy/MDMA users (Parrott et al, 2000, 2001; Rosier et al, 2005; Schifano, 2000). Some authors have noted that the problems emerge following drug usage (Alati et al, 2007), whereas others have found adverse psychiatric profiles prior to drug initiation (Lieb et al, 2002). A third group of studies have employed the more interactive 'diathesis-stress' model, where prior sensitivities are exacerbated by the biological stress of regular drug usage. MacInnes et al (2001) presented a vulnerability model of depression, where individuals with prior vulnerability factors, were more susceptible to adverse drug reactions. The HPA axis is important for health and homeostasis, and stimulant drugs such as MDMA can disrupt its biological integrity. In dance clubbers, MDMA induces an 800% release in the stress hormone cortisol (Parrott et al, 2008), and this may be particularly disruptive for endogenously susceptible individuals.

Conclusions: Stimulant drugs such as MDMA are powerful metabolic stressors which disrupt the HPA axis and other neurobiological systems. Individuals with prior susceptibility factors may be more susceptible to the psychobiological stress of regular stimulant drug usage.