



Substance related disorders

Monday, April 4, 2005

S-23. Symposium: Psychopharmacology of opiate addiction

Chairperson(s): Markus Gastpar (Essen, Germany)
08.30 - 10.00, Gasteig - Black Box

S-23-01

Evaluation of drug consumption rooms for drug addicts

N. Scherbaum. *Rheinsiche Kliniken Essen, Essen, Germany*

Objective: In drug consumption rooms drug addicts are able to use heroin or cocaine in a hygienic environment without fear of prosecution. This study investigates the kind of drug addicts using a drug consumption room and their course.

Methods: During an individual observation period up to six months the course of users of a drug consumption room was evaluated. Clinical interviews were done at onset of the use of the consumption room, and after 1, 2, 3, and 6 months. The clinical interview was based on ASI and on the German documentation standards for addictive disorders.

Results: 129 addicts were included. The majority of them showed risk behavior as currently using non-sterile injection equipment (53%) etc. Most of the addicts (90%) had been in addiction treatment before as methadone maintenance or detoxification treatment. Most addicts used the consumption room only for a few weeks. About 1/3 went to addiction treatment, about 1/5 to incarceration.

Conclusion: The evaluated drug consumption room reaches a target population with risk behavior. However, it did attract only in a small proportion addicts with no previous experience with addiction treatment. Long-term use of the consumption room was rare whereas a lot of patients were successfully transferred to addiction treatment.

S-23-02

Results of the dutch heroin trial

W. van den Brink. *Academic Medical Center, Amsterdam, Netherlands*

Objective: Heroin dependence is a chronic, often treatment resistant disorder, with serious public health implications. Supervised medical prescription of heroin has been proposed to improve the physical and mental health and social condition of those heroin dependent patients not sufficiently benefiting from

methadone maintenance treatment. The aim of this study is to test the efficacy and cost-effectiveness of the new approach.

Methods: Two open label randomized controlled trials – one with inhalable heroin (n=375) and one with injectable heroin (n=174) - were conducted, comparing a six month and a 12 month treatment of heroin plus methadone with methadone alone, keeping the psychosocial treatment offer constant. Heroin was offered seven days per week and three times per day, whereas methadone was dispensed 2-7 times per week for daily use.

Results: Adherence was excellent with 12-month outcome data available for 94% of the randomized patients. Using an intention-to-treat analysis, twelve-month treatment with heroin plus methadone was significantly more effective than treatment with methadone alone: inhalable trial response rate 47.9% versus 25.2% (difference 22.7%; OR=2.77); injectable trial response rate 56.6% versus 31.6% (difference 25.0%; OR=2.99). Similar effects were observed with full symptomatic recovery and sustained response as effect parameters. Discontinuation of the co-prescribed heroin resulted in a rapid deterioration in the vast majority (83%) of the treatment completers who responded to the co-prescribed heroin. The incidence of serious adverse events was similar in the treatment conditions. With the exception of previous abstinence oriented treatments, no clinical predictors for response could be identified. A cost-utility analysis showed that heroine prescription was not only efficacious, but also cost-effective.

Conclusion: Supervised co-prescription of heroin is feasible, more effective, more cost-effective and probably just as safe as methadone alone in reducing the many physical, mental and social problems of chronic, treatment-resistant heroin dependent patients.

S-23-03

Drug monitoring during substitution treatment

C. Eap. *Unité de Biochimie et Psychoph, Prilly-Lausanne, Switzerland*

Objective: Among the various drugs used for substitution treatment such as methadone, buprenorphine, codeine or heroin, the usefulness of therapeutic drug monitoring (TDM) has been demonstrated only for methadone. Thus, it is not expected that TDM of heroin or codeine, or of the active metabolite (i.e. morphine) which is a very short acting compound, would be of any help in the clinical management of patients who are prescribed codeine or heroin. No studies have examined yet the usefulness of TDM of buprenorphine but such studies are warranted, at least for a better understanding of the use of very high doses of buprenorphine requested by some patients, and examining whether this could be due in part to a rapid metabolism of buprenorphine.

On the other hand, TDM of methadone has shown its usefulness in many situations, such as a non-response due to a rapid metabolism, problems of metabolic interactions or risks of cardiac side effects induced by methadone (i.e. prolongation of the QT interval). This will be discussed in details with practical examples, and the latest data of an ongoing large pharmacogenetic study on methadone examining also the problems of cardiotoxicity of methadone will be presented.

Monday, April 4, 2005

S-41. Symposium: The Addictions: Young Researchers Symposium

Chairperson(s): Falk Kiefer (Mannheim, Germany),
Andreas Heinz (Berlin, Germany)
16.15 - 17.45, Holiday Inn - Room 6

S-41-01

Videotapes exposure of delirium tremens reduce the relapse rate in alcohol dependence

A. Mihai. *University Hospital Dept. of Psychiatry, Tg. Mures, Romania*

Objective: Patients with Delirium Tremens (DT) present high relapse rate (more than 80%) in spite of detoxification (Project Match, 1999) Objective of this prospective randomized controlled trials study was to find if individually exposure to videotapes of acute phase of DT could reduce the relapse rate and the amount of alcohol intake comparing with the control group.

Methods: 60 patients with DT were videotaped in acute phase of DT, than randomized in two groups: A - with individually exposure at the videotape after recovery before discharge with explanation of symptoms by the clinician underlying the correlation with alcohol dependence - and B control group. Both groups received the same treatment of acute phase and maintenance phase, not received aversive therapy and psychotherapy. All patients were observed 6 months with monthly - manualized visits. (Project Combine) Informed consent was obtained from all patients.

Results: The results show significant differences in percent of relapse rate after first month 0% vs 20% $p < 0.001$ and also at 6 months 46,66% vs 73,33% $p = 0.04$. The patients of group A experienced less severe relapses, consumed fewer units of alcohol than controls and asked for medical help.

Conclusion: Videotapes exposure of Delirium Tremens reduce the relapse rate and proved to be effective in maintaining the abstinence during 24 weeks. The results are comparable with the results of randomized control trials with acamprosate, disulfiram or psychotherapy (Tempesta, 2000; Hammarberg, 2004; Mann, 2004)

S-41-02

Cue-exposure treatment for alcohol dependent patients: Analysis of patients' characteristics associated with beneficial treatment effects

S. Löber, B. Croissant, A. Heinz, H. Flor, K. Mann. *Dept. of Addictive Behaviour, Mannheim, Germany*

Objective: Based on the concept of cue-reactivity, cue exposure treatment techniques have been advocated as potentially effective treatments of addiction and some studies have proved its

efficacy compared to standard treatment or relaxation training. In contrast, our results of a controlled treatment trial comparing cue-exposure therapy (CET) to an established cognitive-behavioral treatment approach (CBT), did not support previous findings since we found no beneficial effects of CET on drinking behavior. As cue-reactivity may be necessary for extinction trials to be effective, we addressed in a post-hoc analysis the question whether there are subgroups of patients with special characteristics who show greater effects of CET than the comparison treatment.

Methods: All patients ($N = 57$) fulfilled the criteria of alcohol dependence (DSM-IV) and had taken part in a 3-week qualified alcohol detoxification program. Patients had been randomly assigned to CET or CBT. Based on theoretical considerations, we classified patients post-hoc according to "urge-reactivity", "psychophysiological responding" and degree of dependence. We compared relapse rates and drinking outcome in the six month following discharge.

Results: We found no beneficial effects of CET for patients who show a higher urge-reactivity or psychophysiological responding to alcohol cues. However, our results suggest that patients with severe alcohol dependence show better treatment outcome after CET than CBT.

Conclusion: Due to the small sample size of this subgroup of patients, these results need to be viewed with caution, but they are in line with the results of some other studies, which found beneficial effects of CET for patients with severe dependence.

S-41-03

G. Breen. *Institute of Psychiatry, Kings, London, United Kingdom*

S-41-04

What can imaging studies contribute to illuminate alcohol relapse?

J. Wrase, T. Kienast, T. Siessmeier, P. Bartenstein, D. F. Baus, N. Makris, K. Mann, H. C. Breiter, A. Heinz. *Dept. of Psychiatry, Univ. Hos, Berlin, Germany*

Objective: Animal experiments have provided evidence that the striatum, the amygdalae and medial prefrontal cortex play a predominant role in the acquisition and maintenance of drug seeking behavior. A reduced amygdala volume was found in cocaine dependent subjects. Alcohol stimulates dopamine release in the nucleus accumbens and thus reinforces substance intake. This study sought an association of dopaminergic dysfunction, cue-induced BOLD response, volumetric data, alcohol craving and relapse.

Methods: Functional magnetic resonance imaging (fMRI) and visual alcohol-associated and control cues were used to assess brain activation in abstinent alcoholics and control subjects. The radioligand [^{18}F]DOPA and positron emission tomography (PET) was used to measure presynaptic dopamine production in the striatum and the radioligand [^{18}F]desmethoxyfallypride [^{18}F]DMFP for D2 receptor availability. Amygdalae volumes were assessed via segmentation-based morphometry. Alcohol craving was measured with the Alcohol Craving Questionnaire (ACQ). Patients were followed for six months and alcohol intake was recorded.

Results: We observed a close association of a low availability of D2-dopamine receptors and striatal dopamine production in the nucleus accumbens, craving and increased functional activation of fronto-cortical and limbic neurocircuits during the presentation of alcohol-associated cues among abstinent alcoholics. Visual alcohol cues activated the putamen, anterior cingulate and adjacent medial