



## Psychiatry

## A STUDY OF RELAPSE, SENSATION SEEKING AND SEVERITY IN MALES WITH ALCOHOL DEPENDENCE

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**ABSTRACT** **Background:** Alcohol Dependence is one of the most common illnesses among psychiatric disorders. Majority of Alcohol dependant patients relapse within a year of starting treatment. Current study tried to find out the relapse rates in alcohol dependence, influence of sensation seeking traits and severity of dependence in precipitating relapse.

**Methodology:** A cross-sectional study was conducted on male patients who were diagnosed with alcohol dependence and attained early full remission. Relapse rates in that population were observed. The sensation seeking traits and severity of dependence were measured using Sensation seeking scale and Severity of Alcohol Dependence Questionnaire.

**Results & Conclusion:** The relapse rates were found to be as high as 54.7%. Sensation seeking traits and severity of dependence has a significant impact on relapse. Hence interventions targeting sensation seeking traits will help in preventing relapse.

**KEYWORDS :** Alcohol dependence, Relapse, Severity, Sensation seeking

## INTRODUCTION

Alcohol Dependence Syndrome is one of the most common and one of the most researched illnesses among psychiatric disorders. Alcohol dependence is a chronic and relapsing condition that needs to be understood in psychosocial context. The Global Burden of Disease Project estimated alcohol to be responsible for 1.5% of all deaths and 3.5% of the total Disability Adjusted Life Years (DALYs)<sup>1</sup>. Relapse, or the return to heavy alcohol use following a period of abstinence or moderate use, occurs in many patients who have undergone treatment for alcoholism. Traditional alcoholism treatment approaches often conceptualize relapse as an end-state, a negative outcome equivalent to treatment failure<sup>2</sup>. Substance dependence is a major problem worldwide, India being no exception<sup>3</sup>. Relapse is a quiet complicated process and dynamic in its course that appears to be determined by the interaction of both neurobiological and psychosocial processes<sup>3</sup>. A majority of patients relapse within a year of starting treatment, with the first three months being the most vulnerable period<sup>4</sup>. Relapse is difficult to treat for the therapists and usually has several adverse consequences for patients. In one of the most influential social-cognitive behavioural models proposed by Marlatt<sup>5,6</sup>, relapse has been viewed as an unfolding process in which resumption of substance use is the last event in a long sequence of maladaptive responses to internal or external stressors. Various researchers have defined relapse in different ways for this study purpose we defined relapse as follows-

- to consider any drinking by alcohol dependent patient as relapse irrespective of the quantity consumed (Sass et al., 1996; Whitworth et al., 1996; Poldrugo ., 1997; Geerlings et al., 1997; Pelc et al., 1997)<sup>7</sup>
- patients who started drinking after attaining early full remission as per DSM-4<sup>8</sup>

There is evidence that approximately 90 percent of alcoholics are likely to experience at least one relapse over the 4-year period following treatment<sup>9</sup>. Despite some promising leads, no controlled studies definitively have shown any single or combined intervention that prevents relapse in a fairly predictable manner. Thus, relapse as a central issue of alcoholism treatment that warrants further study.

Similar relapse rates for alcohol and other addiction suggest that the relapse mechanism for addictive disorders may share common biochemical, behavioural, or cognitive components<sup>10,11</sup>. The relapse behaviour not only depends on the physiological changes like craving, withdrawal features but also on the person's response to high risk situations, stressors. This responsiveness depends on the personality traits like sensation seeking. The intensity of physiological changes depends on the severity of dependence and the duration of dependence.

So particular emphasis shall be given on psychosocial factors and their biological interactions in perpetuating the vulnerability to relapse<sup>12,13</sup>. Sensation seeking is defined as "the need for varied, novel and complex sensations and experiences and the willingness to take physical and social risks for the sake of such experiences" (Zuckermann, 1979)<sup>14</sup>. These personal factors accompany the neurobiological factors and trigger the relapse. In this study we have tried to focus on the interaction between personality traits like sensation seeking and severity of dependence which affect the relapse.

## AIMS AND OBJECTIVES

The aim of the study is to find out the relapse rates in alcohol dependent male and the influence of sensation seeking traits and severity of dependence in precipitating relapse.

## METHODOLOGY

This is an outpatient based cross-sectional study done on patients attending MIMS General Hospital, Vizianagaram in a span of 12 months (February 2015 to January 2016). Male patients who were diagnosed to have alcohol dependence syndrome prior to October 2014 and who attained early full remission were recruited. It's a naturalistic study and all the patients have received a standard detoxification treatment at the initial admission and are maintained on deterrent treatment. Relapse rates were observed in recruited sample. Patients were divided into abstinent group and relapse group.

Sensation seeking traits and severity of dependence were measured using the Sensation seeking scale form V: Indian adaptation and the Severity of Alcohol Dependence Questionnaire respectively in both the groups.

**Inclusion criteria:** Subjects who were diagnosed to have alcohol dependence syndrome as per ICD-10 and who have attained an early full remission were included in the study. Patients who have given consent to participate in the study.

**Exclusion criteria:** Patients who have acute withdrawal features or psychotic features and physical complications were excluded. Patients with other comorbid psychiatric conditions and organic disorders were excluded.

**INSTRUMENTS:** Severity of alcohol dependence was assessed using SADQ<sup>15</sup>, a 20 item likert scale. Sensation seeking as measured with Sensation Seeking Scale, Form V: Indian Adaptation<sup>16</sup>, a 40-item, forced choice inventory which has four different subscales - Thrill and Adventure seeking (TAS), Experience Seeking (ES), Boredom Susceptibility (BS), Disinhibition (DIS).

## OBSERVATIONS AND RESULTS

The total number of patients who have come for follow up and have attained an early full remission was 137. TABLE-1 gives the relapse rates in the sample population. 54.7% of the total sample i.e. 75 out of 137 people who attained an early full remission has relapsed back to drinking.

**TABLE-1: Relapse Rates in Sample Population**

Relapse	Frequency	Percent
Yes	75	54.7
No	62	45.3
Total	137	100

TABLE-2 shows the influence of sensation seeking including the sub scales on precipitation of relapse in alcohol dependence patients. The patients who relapsed show high sensation seeking total score with a mean value of 26.25 when compared to mean value of 10.29 in the patients who don't relapse. It is very significant with a p value of < 0.01. The individual subscales in Sensation Seeking Scale like Thrill and Adventure Seeking (TAS), Experience Seeking (ES), Boredom Susceptibility(BS) and Disinhibition Seeking (DIS) have also shown a significant difference (p-value < 0.01) in both the groups. TABLE-2 also shows that the people with more severe of dependence tend to relapse more than those with less severe dependence. The mean SADQ score in the relapse group is 30.21, which is highly significant when compared to the other group with a mean value 14.48 with a p value of <0.01.

**TABLE-2: Relation between Relapse, Sensation Seeking and Severity of Dependence (\*\*-p value<0.01)**

Variable	Relapse	n	Mean	Std. Deviation	t-value
TAS	Yes	75	6.41	2.163	13.976**
	No	62	2.37	1.149	
ES	Yes	75	6.65	1.774	15.403**
	No	62	2.69	1.223	
BS	Yes	75	6.40	1.823	14.242**
	No	62	2.74	1.159	
DIS	Yes	75	6.77	2.077	15.524**
	No	62	2.47	1.097	
Sensation Seeking Total Score	Yes	75	26.25	4.759	23.623**
	No	62	10.29	3.096	
SADQ	Yes	75	30.21	7.708	15.220**
	No	62	14.48	4.136	

TABLE-3 gives the relation between relapse and degree of severity of dependence. There is significant increase (p<0.05) in the number of relapsed cases with increasing severity of dependence i.e. in mild dependence 3 patients out of 42 have gone back to drinking, whereas in severe dependence 37 out of 39 patients have shown relapse behaviour.

**Table-3: Relationship between Relapse and Severity of Dependence**

Relapse	SEVERITY OF DEPENDENCE				p-value
	Mild	Moderate	Severe	Total	
Yes	3	35	37	75	0.000**
No	39	21	2	62	
Total	42	56	39	137	

## DISCUSSION

Alcohol dependence is one of the most common psychiatric illnesses. The global burden of the disorder is enormous and it has entered the roots of every society in the world. Alcohol has widespread effects in various domains of an individual like social, physical, psychological, occupational etc. The people under the effect of the substance may exhibit some high risk behaviours such as high risk sexual behaviour<sup>17</sup>, violent and criminal acts<sup>18,19</sup>, self injurious behaviour<sup>20</sup>, and fatal injury including motor vehicle accidents<sup>21</sup>.

In our study the relapse rate is 54.7% which indicates that more than half of the patients who attained an early full remission have gone back to drinking. There is no question that relapse represents a prevalent and significant problem in alcoholism. In fact, given the high rate of recidivism in alcoholism, relapse clearly is a major impediment to

treatment efforts.

Though the biological basis provides many theories for relapse, it is always the interaction between the environmental and the biological factors that triggers the relapse. The personality traits play a great role in addiction behaviours because one of the most common causes for relapse is poor coping behaviour in high risk situations. The sensation seeking traits are very important not only in precipitating the relapse but also in leading to risk taking behaviours. In our study the relapse group was found to have high scores in all subscales of sensation seeking but more so for experience seeking and disinhibition traits as denoted by their high mean values 6.65 and 6.77 respectively. It's understandable that the experience seeking behaviour and addiction behaviour always go in parallel. Persons with these traits have the desire to seek experiences by living in a non conforming lifestyle and have unconventional social company which increases risk of relapse. Persons who have stopped taking alcohol may take alcohol again because of their sensation seeking traits and that triggers the relapse. Given the public health importance of alcohol dependence, it is worthwhile studying in greater depth, the role of sensation seeking in precipitating relapse.

The severity of dependence is another important predictor but not the duration of the dependence as per our study. With increase in severity from mild to severe, the relapse rates have also gone up. It is explicable by the tolerance, craving and withdrawal anxiety levels that we see in severely dependent and they trigger a relapsing behaviour. The majority of alcoholic patients entering treatment have reported insomnia symptoms and use alcohol as self medication<sup>22</sup>. Given the potential link between severity, insomnia and relapse, routine assessment of severity of dependence in clinical and research settings is warranted.

## LIMITATIONS

The sample was restricted to men with substance dependence attending a tertiary care hospital. The findings thus cannot be generalized to other patient populations with substance dependence. One time cross-sectional evaluations employed may have failed to capture the dynamic nature of the process of relapse. The study was exclusively limited to sensation seeking traits and severity of dependence and biological factors were not considered.

## CONCLUSION

The relapse rates are as high as 54.7% in patients after attaining early full remission. Sensation seeking traits and severity of dependence has a significant impact over precipitation of relapse. The study stresses on the need for a proper psychotherapeutic intervention to address the sensation seeking traits in the patients with dependence to prevent relapse.

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