



**EFFECTIVENESS OF RELAPSE PREVENTION THERAPY ON BIO-PSYCHO-SOCIAL PARAMETERS AMONG INDIVIDUAL AND DYADIC GROUP ALCOHOL DEPENDENTS**

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**ABSTRACT**

The effectiveness of RPT on bio-psycho –social parameters among 24 alcohol dependents were done in selected de-addiction centers at Thanjavur district. 12 samples were in experiment and 12 were in control group samples were selected by using the cluster sampling Technique. True experimental pre test – post test control group design were used. Data were collected through interview method by using 3 standardized Questionnaires, 1 semi –structured questionnaire and laboratory test method was used to assess the bio-psycho-social parameters. The obtained paired ‘T’ test score had significant effect on ‘P’ Value < 0.05 in biological parameters (Audit) – psycho-social parameters in experimental group. It indicates the given RPT was effective in both IAD & DAD . There was a highly positive significant correlation in experimental group. The obtained unpaired ‘t’ test score for comparison between experimental and control groups showed a significant difference in bio(Audit) Psycho-Social parameters of the experimental group alone .The comparison between IAD & DAD group had significant difference in Bio (Audit) psycho social parameters of the experimental groups. Hence the study result revealed that RPT was effective for the experimental groups. And RPT with Care givers support was more effective in DAD experimental group. So RPT with care givers support was more effective on bio-psycho-social parameters of alcohol dependents.

**KEY WORDS:** IAD – Individual Alcohol Dependents, DAD- Dyadic Alcohol Dependents, RPT – Relapse Prevention Therapy, SGOT – Serum Glutamic-Oxaloacetic Transaminase, SGPT-Serum Glutamic Pyruvic Transaminase.



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## INTRODUCTION

Alcoholism is the leading psychiatric problem in the world today. Alcoholism is not only affects the alcoholic dependents it also affects the family and society. National Institute on Drug abuse, 2003<sup>1</sup> reported that 81% of people in USA age 12 and older have used alcohol sometime in their lives. WHO, 2014<sup>2</sup> stated that the amount of alcohol consumption has risen in India between the periods of 2008 to 2012. Based on that report, around 30% of the total population of India consumed alcohol in the year 2010. Among that 93% was consumed in the form of spirit and 7% beer and less than 1% wine. An average Individual over the age of 15 consumed over 8 liters of alcohol per annum in the south India. Nearly 11% of Indians indulged in heavy or binge drinking global figure stood at 16% on the "years of Life Lost" scale which is based on alcohol attributable years of life lost India has been rated 4 on a scale of 1 to 5. This implied that the alcohol consuming population of our country uses most years of their life because of drinking and its consequences. Bhanu Prakash Kolla MD, MRC Psych., Terry Schneekloth MD., Meghna.P Mansukhani MD., Joanna M.Biernacka Ph.D Daniel Hall-Flavin MD., Victor Karoyak MD., Jennifer Geske MS and Mark A.Frye MD., American journal of addiction 2015<sup>3</sup> reported that Patients admitted to a 1-month residential addiction treatment program the Pittsburg Sleep Quality Index (PSQI) at admission/discharge, the Alcohol Use Disorders Identification Test (AUDIT), Patient Health Questionnaire-9 (PHQ-9), and Pennsylvania Alcohol Craving Scale (PACS) were administered. Patients were contacted every 3 months over 1 year following discharge. Associations of clinical factors with time until relapse were examined using univariate Cox proportional hazard models. 119 patients with alcohol use disorders met inclusion criteria (mean age  $50.6 \pm 13.2$  years, 57% male), sleep disturbances as measured by the PSQI were not associated with alcohol relapse at 12 months. Alcohol use as a hypnotic and hypnotic use at admission were associated with subsequent relapse. Ryan. J. Martin PhD, Beth. H, Chaney PhD, and Jennifer Cremeens-Matthews PhD, American journal of addiction 2015<sup>4</sup> reported that 4 anonymous field studies to examine associations between breath alcohol concentration (BrAC) levels, Alcohol Use Disorders Identification Test (AUDIT-C) classification, and plans for getting home among a sample of bar-attending college students (N = 713). one-way ANOVAs indicated that participants classified by the AUDIT-C as not having an alcohol problem had a significantly lower BrAC% than those classified as having a potential problem and participants planning to drive had a significantly lower BrAC% than those with a plan that did not involve them driving and those without a plan to get home. Although it is encouraging that most of our sample was not intending to drive, it is important to continue to attempt to reduce impaired driving in this population. Manosha Thanka.M, Journal of Nightingale Nursing times 2014<sup>5</sup> done a Quasi-experimental study to evaluate the effectiveness of

aerobic exercise on stress among alcohol dependents. The pre test mean score 27.93 and for post test 19.4. The result proceed that the stress level was reduced to the alcohol dependents. Hollis.C.karoly, Courtne J.Stevens., Rachel E.Thayer., Renee E.Magnan.,Angela D.Bryan and Kent E.Hutchison., Research society of alcoholism 2013<sup>6</sup> conducted the clinical and experimental study among 60 individuals underwent a diffusion tensor imaging session and completed the measures of alcohol consumption, loss of control over drinking and aerobic exercise participation. The result indicated that there was an association between the heavy alcohol consumption with white matter damage in the external capsule and superior longitudinal fasciculus Knight. J.R., Henry Wechsler., Meichunkuo., Mark Seibring.,Elissa R Weitzman., Mare A Schuckit., journal of studies on alcohol. 2002<sup>7</sup> explored that to estimate the prevalence of alcohol abuse and dependence among U.S. college students, and to identify characteristics associated with these diagnoses. More than 14,000 students who completed a questionnaire that included items corresponding to DSM-IV diagnostic criteria for alcohol abuse and dependence. The study reported that many college students' behaviors and symptoms that meet the diagnostic standard for alcohol abuse or dependence. In addition to strengthening prevention programs, colleges should implement new strategies for screening and early identification of high risk student drinkers and ensure that treatment is readily available for those with alcohol disorders

## MATERIALS AND METHODS

The ethical clearance was obtained from the ethical committee of Saveetha University, Chennai with the registration number 002/10/2013/IEC/SU dated 15.10.13. Permission obtained from the de-addiction centers to conduct the study. Assurance was given to the subjects that the anonymity, confidentiality and subject privacy would be maintained. True experimental design (pre and post test Control group design) was used in this study. The pilot study was conducted at the selected de-addiction centers at Thanjavur. Probability random sampling technique (lottery) method was used to select the de-addiction centers. Again cluster sampling Technique was used to select the 24 samples; 6 samples in each group such as experimental and control group of IAD and DAD groups. Data were collected through interview technique by using 3 standardized Questionnaire.1 semi –structured Questionnaire and laboratory method to assess the bio-psycho-social parameters. In biological parameters, lab testing method was used to assess the SGOT and SGPT levels and AUDIT scale was used to assess the severity of alcohol consumption. In psychological parameters, alcohol abstinence self efficacy scale was used to assess the self efficacy, SOCRATES Scale was used to assess the Motivation and for sociological parameters semi-structured Alcohol Related Problems Questionnaire was used to assess the alcohol related problems respectively.

The pretest was done by using the afore mentioned 4 tools and lab testing to all the 24 samples, 6 sessions ( 2 sessions per week for 3 weeks) of Relapse Prevention Therapy were provided to the samples of experimental group in IAD and DAD groups. After 15 days of the intervention the post test was conducted by using the same tools to both the experimental and control groups. Then the collected data were compiled and analyzed by using the descriptive and inferential statistics through SPSS package and tabulated according to the hypotheses.

## RESULTS AND DISCUSSION

According to H1, there was a significant difference between the pre and post test scores of bio –psycho-social parameters among the experimental groups (IAD&DAD). So H1 is accepted, but the same it was rejected for the SGOT & SGPT levels of experimental groups and all the bio psycho –social parameters of control groups of (IAD&DAD). Hence the given RPT therapy was effective in experimental group as shown in table 1.1.

**Table 1.1**  
**Represents the pre and post test levels of bio-psycho-social parameters among the alcohol dependents in both experimental and control groups of IAD& DAD.**

*N= 6 (for each group) =24*

Group	AUDIT	SGOT	SGPT	ARP	Socrates	Self efficacy
DE	3.28*	1.920	1.836	6.98*	37.39*	30.0*
DC	0.630	1.876	1.876	1.62	1.118	1.274
IE	2.482*	1.485	1.941	5.385*	25.991*	29.94*
IC	1.052	1.162	1.965	0.929	0.067	0.773

*\*Significant effect*

According to H2, there was a highly positive significant correlation between the post test scores of selected bio-psycho-social parameters among the alcohol dependents

in experimental groups but there was a moderate positive significant correlation among the control groups of IAD & DAD. Hence the H2 is accepted as shown in table 1.2.

**Table 1.2**  
**Represents the correlation between the post test scores of selected bio-psycho-social parameters among the alcohol dependents in both experimental and control groups of IAD & DAD**

*N= 6 (for each group) =24*

Group	ARP with AUDIT	Self efficacy with Motivation
DE	0.8144	0.9167
DC	0.4758	0.5423
IE	0.8192	0.8488
IC	0.4605	0.4183

According to H3, There was a significant difference in psycho-social parameters between the alcohol dependents of experimental group and control groups Hence the H2 is accepted, but the same it was rejected

for the biological parameters of IAD groups and SGOT and SGPT levels of the DAD groups. So the given RPT was effective for experimental groups as shown in table 1.3.

**Table 1.3**  
**Represents the comparison of bio-psycho-social parameters between the alcohol Dependents of experimental and control group**

*N= 12 (for experiment and control group) =24*

Group	AUDIT “t” value	SGOT “t” value	SGPT “t” value	ARP “t” value	Socrates “t” value	Self efficacy “t” value
IE& IC	0.338	1.802	1.805	1.876*	18.366*	25.6*
DE&DC	2.465*	0.33	0.079	4.541*	15.92*	17.42*

*\*Significant difference*

According to H4, There was a significant difference in bio-psycho-social parameters between the alcohol dependents of both individual and dyadic group of experimental groups. Hence H4 is accepted, but the

same it was rejected for the control groups and SGOT and SGPT levels of experimental group. So the Care givers support with RPT therapy was very effective as shown in table 1.4

**Table 1.4**  
**Represents the comparison of bio-psycho-social parameters between the alcohol dependents of dyadic and individual groups**

N= 12 (for individual and dyadic group)= 24

GROUP	AUDIT	SGOT	SGPT	ARP	Socrates	Self efficacy
	"t" value	"t" value	"t" value	"t" value	"t" value	"t" value
IE& DE	1.867*	0.477	0.134	2.511*	2.402*	3.558*
IC&DC	0.180	1.633	1.61	1.553	1.635	1.677

\*Significant difference

## CONCLUSION

It was inferred that the Relapse Prevention Therapy was independently effective in bio-psycho-social parameters for alcohol dependents of experimental groups where as the Relapse prevention therapy with care givers' support was more effective in bio-psycho-social parameters among the alcohol dependents of dyadic experimental group when compared with the individual experimental group. In Nursing Practice the findings of this study will help the nurses to understand the importance of Relapse Prevention Therapy and the role of caregivers in the treatment of alcohol – dependents. It will be useful to understand the importance of follow-up and reinforcement to prevent the relapse among alcohol dependents. In Nursing Education this study will help to create awareness among the nursing students regarding the relapse prevention in alcohol – dependents. The

students may take steps to enhance the participation of the caregivers while the alcohol – dependent is taking treatment in de- addiction centers. The students will understand the importance of follow –up care. In Nursing Administration The nurse administrators at the top level who plan the de – addiction programmes will understand the importance of Relapse Prevention Therapy for alcohol – dependents and the role of caregivers and intense follow-up care for the prevention of relapse in alcohol – dependents and they can plan accordingly. In Nursing Research the study findings will – help the nurse researchers to do many research on relapse prevention therapy among alcohol - dependents using different types of interventions like IAD, (Individual Alcohol Dependents) DAD (Dyadic Alcohol Dependents) etc., they can gain in-depth knowledge regarding the importance of follow-up care in alcohol – dependent s after taking treatment in de-addiction centers

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