TEMPERAMENTAL CHARACTERISTICS AND PSYCHOPATHOLOGY AMONG CHILDREN OF ALCOHOLICS

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ABSTRACT

The impact of family and child rearing practices on personality development and psychiatric illnesses are well established. The present investigation is directed towards the study of psychopathology and temperamental characteristics of children of alcoholic parents, to find out correlation between these two areas and the role of alcoholism in child rearing practices. A group of 100 children of alcoholic parents was selected through random sampling between the age range of 4-12 years and compared with the children of nonalcoholic parents (N=100). Both groups were assessed on Temperamental Measurement Schedule. The student 't' test and product moment was computed for comparative and correlation purposes. The children of alcoholics were found to be manifesting marked psychopathological disturbances. These children were also found to be more arrhythmic manifesting negative mood and low persistence as compared to the children of control group. The positive correlation between psychopathological and temperamental characteristics have been indicated.

Key words: Children, alcoholism, personality, temperament, psychopathology

People since earliest times have consumed alcohol for euphoric purposes, to celebrate festivities, to solemnize religious rituals, to grace social functions and to obtain ease from immediate or continuing emotional stress. Excessive indulgence came to be considered as a depraved and criminal behaviour. In recent years, however, it has been recognized that alcoholism is psychiatric, psychological and/or social problem that entails a staggering cost to the individual and the society. Further, that control of the deleterious consequences of abuse of alcohol necessitates evaluation of a multitude of factors which not only motivate people to drink but also may contribute in some to its direct consequences (e.g. genetics and child's emotional experience).

It is becoming increasingly evident that the children of a family in which one or both parents are suffering from chronic or recurrent mental illness, are at greater risk of developing psychiatric symptoms (Rutter, 1966). The risk, however, is not an inevitable consequence of parental mental illness alone but may be a result of the involvement of these children in abnormal parental behaviour and of family discord, maladaptive communication and impaired parent-child interaction.

The home environment of the children of alcoholics show diminished global function-
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ing. In particular, they are characterized by marital conflict, parent-child conflict, poor adaptive functioning on the part of the parent and in some cases by physical abuse.

The present investigation is directed towards the study of the children of alcoholic fathers to understand their temperamental characteristics and its correlation with psychopathology.

MATERIAL & METHOD

The sample for the investigation has been selected amongst the children of alcoholic fathers who came to psychiatry out patient section of Dayanand Medical College and hospital for deaddiction, and from the normal nonalcoholic population. The total number of 200 children (100 with alcoholic fathers, and 100 with nonalcoholic fathers), have been taken for the study. The age range of both groups of sample were between 4 years to 12 years. Both the groups were matched for sociodemographic variables.

Childhood Psychopathology Measurement Schedule (CPMS) was used to assess psychopathology among both groups. The CPMS was adapted in India, from Achanback's (BCI) by Malhotra's (1984). It consists of 75 items in Hindi and English both to be rated in two point scale, '0' for absent and '1' for present. It is in the form of an interview schedule that can also be used as a self-administered questionnaire. It is applicable to children of both sexes in the age range of 4-12 years. The informant has to be a parent. Scores of the items constellating on each of the eight factors are:

Factor-I : Low intelligence with emotional problems
Factor-II : Conduct disorder
Factor-III : Anxiety
Factor-IV : Depression
Factor-V : Psychotic symptoms
Factor-VI : Special symptoms
Factor-VII : Physical illness with emotional problems
Factor-VIII : Somatization

Temperament measurement schedule (Malhotra, 1984) was used to assess temperament characteristics of these children. This schedule measures nine temperamental variables described by Thomas and Chess, with 45 items (5 each for 9 variables) to be rated on a 5 point scale. Two extreme scores of 1 and 5 are provided with definitions with a mid point score of 3, scores less than 3 are in a positive direction for intensity and frequency of the behaviour measured by each item. Mean scores for each of the variables are computed by dividing the total scores by 5.

RESULTS

Statistically significant differences have been found to the extent of psychopathology between two groups on factors: conduct disorder (p<0.01), anxiety (p<0.01), physical illness with emotional problems (p<0.01) and somatization (p<0.01). Rest of the factors have been found to be nonsignificant (table 1). On temperament measurement schedule, significant differences have been found in the area of mood (p<0.01), persistence (p<0.01), and rhythmicity (p<0.01) (table 2). Out of 9 variables, 3 variables have significantly negative correlation (p<0.01) i.e. rhythmicity, mood and persistence with psychopathology, whereas distractibility and activity were found to be having positive correlations (p<0.01) (table 3).
### TABLE 1
**EXTENT OF PSYCHOPATHOLOGY AMONG THE SON'S OF ALCOHOLICS AND NON ALCOHOLICS**

| Factors | Range of obtained score | Mean ± s.d. | t-value |
|---------|-------------------------|-------------|---------|
| **FACTOR - I (max. possible score-16)**<br>Son's of alcoholics | 0-16 | 3.16±1.85 | 1.27 |
| Son's of non alcoholics | 0-6 | 2.84±1.71 | |
| **FACTOR -II (max. possible score-17)**<br>Son's of alcoholics | 3-12 | 5.85±2.12 | 10.14** |
| Son's of non alcoholics | 1-7 | 2.94±1.94 | |
| **FACTOR -III (max. possible score-5)**<br>Son's of alcoholics | 1-5 | 3.10±0.99 | 7.78** |
| Son's of non alcoholics | 1-4 | 1.94±1.11 | |
| **FACTOR -IV (max. possible score-13)**<br>Son's of alcoholics | 0-6 | 2.54±2.02 | 1.88 |
| Son's of non alcoholics | 0-6 | 2.09±1.74 | |
| **FACTOR -V (max. possible score-9)**<br>Son's of alcoholics | 0-4 | 1.36±0.94 | 0.55 |
| Son's of non alcoholics | 0-3 | 1.29±0.86 | |
| **FACTOR -VI (max. possible score-3)**<br>Son's of alcoholics | 0-3 | 0.27±0.54 | 1.88 |
| Son's of non alcoholics | 0-2 | 0.14±0.42 | |
| **FACTOR -VII (max. possible score-4)**<br>Son's of alcoholics | 0-3 | 0.77±0.60 | 2.40 |
| Son's of non alcoholics | 0-2 | 0.53±0.48 | |
| **FACTOR -VIII (max. possible score-6)**<br>Son's of alcoholics | 0-5 | 1.83±1.34 | 3.71** |
| Son's of non alcoholics | 0-4 | 1.15±1.17 | |

**p<0.01**
TABLE 2
TEMPERAMENTAL CHARACTERISTICS AMONG THE CHILDREN OF ALCOHOLICS AND NON ALCOHOLICS

| Temperamental variables | Range of obtained score | Mean±s.d. | t-value |
|-------------------------|-------------------------|----------|---------|
| **APPROACH WITHDRAWAL** |                        |          |         |
| Son's of alcoholics     | 16-23                   | 3.89±1.452 | 1.231   |
| Son's of non alcoholics | 16-23                   | 2.64±1.532 |         |
| **ADAPTABILITY**        |                        |          |         |
| Son's of alcoholics     | 17-24                   | 4.22±1.43 | 1.180   |
| Son's of non alcoholics | 18-25                   | 4.27±1.446 |         |
| **THRESHOLD OF RESPONSIVENESS** |                |          |         |
| Son's of alcoholics     | 12-20                   | 3.27±1.452 | 1.5447  |
| Son's of non alcoholics | 13-21                   | 3.33±1.29 |         |
| **MOOD**                |                        |          |         |
| Son's of alcoholics     | 12-20                   | 3.16±1.620 | 2.2055**|
| Son's of non alcoholics | 12-20                   | 3.26±1.5859 |        |
| **PERSISTENCE**         |                        |          |         |
| Son's of alcoholics     | 12-20                   | 2.93±1.53 | 8.639** |
| Son's of non alcoholics | 12-20                   | 3.30±1.385 |         |
| **ACTIVITY LEVEL**      |                        |          |         |
| Son's of alcoholics     | 12-21                   | 3.34±1.32 | 0.03966 |
| Son's of non alcoholics | 12-20                   | 3.28±1.4907 |        |
| **INTENSITY**           |                        |          |         |
| Son's of alcoholics     | 12-20                   | 3.24±1.6116 | 0.406   |
| Son's of non alcoholics | 13-21                   | 2.26±1.522 |         |
| **DISTRACTIBILITY**     |                        |          |         |
| Son's of alcoholics     | 13-21                   | 3.36±1.476 | 1.431   |
| Son's of non alcoholics | 13-21                   | 3.26±1.585 |         |
| **RHYTHMICITY**         |                        |          |         |
| Son's of alcoholics     | 12-18                   | 2.89±1.43 | 14.40** |
| Son's of non alcoholics | 14-21                   | 2.61±1.635 |         |

For all variable max. possible score is 25
** p<.01
TABLE 3
CORRELATION OF PSYCHOPATHOLOGY WITH TEMPERAMENTAL CHARACTERISTICS

| Correlation of psychopathology | Value of 'r' |
|--------------------------------|-------------|
| Activity                       | 0.30*       |
| Rhythmicity                    | -0.42*      |
| Approach-withdrawal            | 0.19        |
| Adaptability                   | -0.16       |
| Mood                           | -0.34*      |
| Intensity                      | 0.14        |
| Threshold                      | -0.18       |
| Distractibility                | 0.38*       |
| Persistence                    | -0.53*      |

* p<.01

DISCUSSION

Various researchers over the past two decades, have reported physical as well as mental abnormalities in the children of alcoholic parents. Among the most important findings are: retarded psychomotor development, low intelligence and impaired social & vocational performance (Lemonic et al., 1968; Streissguth, 1976).

In the present study, marked disturbances have been found in the children of alcoholics in the areas of conduct disorders, anxiety, physical illness with emotional problems and somatization as compared to children of non-alcoholics. Since the present study included only male alcoholics, low intelligence has not been found, as was seen in earlier western studies, where low intelligence resulted from the effect on morphogenesis on mother's womb.

The significant differences in the findings of children of alcoholics and non-alcoholics supports the notion that parental alcoholism increases the range of stressful experiences such as interparental arguments, expressions of parental hostility to the child or neglect of the child, economic reversal for the family, parental illness or hospitalization and accidents. The home environment of the children of alcoholics show diminished global functioning. In particular, they are characterized by marital conflicts, parent-child conflicts, poor adaptive functioning on the part of the parents and by physical abuse.

Exposure to parent's drinking behaviour, also facilitate the likelihood of alcoholism among the children of alcoholics. Other mental and physical problems determined by the nature of the children's experience, strategies of coping, ways of understanding and reacting to the alcoholic parent. Historically, most studies of children explore the immediate short-term negative effects of parental alcoholism and over look coping patterns and mechanisms which may explain why some youngsters remain relatively unaffected, and some are affected to greater degrees.

It has also been reported that the sons of alcoholics had more psychological problems than the children of nonalcoholic parents.

As far as temperament is concerned, the individual specific reaction pattern appears in the first few months of life, persists in a stable form and significantly influences the nature of the child's response to all environmental events, including child rearing practices. It remains true, however, that in our study sample the temperamental traits and constellations identified by the frequency of their association with behaviour disorders included, arrhythmic, manifesting more of negative mood and having low persistence as compared to the children in the control group.

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