THOUGHT-STOPPING AND HABITUATION IN OBSESSIVE COMPULSIVE STATES: SOME OBSERVATIONS

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Introduced by G.J. Taylor, an Eighteenth century philosopher, Thought stopping found its way into behaviour therapeutic procedures by the efforts of Wolpe. It is interesting to know that Wolpe himself had a bout of obsessional rumination and got it treated with thought stopping (Wolpe 1973). Subsequently Yamagami (1970) and Marks et al (1975) have reported on outcome that ranges from 75% to 90%. From the statistical point these results of a disorder which was considered as having poor prognosis is quite satisfactory. But for theoretical and practical considerations Foa (1979) had tried to analyse therapeutic failures closely and had described various sub-groups in this disorder. Stimulated by her observations we have analysed a group of Obsessive compulsive neurotics treated with Thought-stopping.

The objectives are:

1. Can the phenomenon of habituation be used to explain the mechanism of thought-stopping?

2. Can those individuals who are likely to cause therapeutic failure be screened and response be predicted.

3. Can we improve the success ratio by other intervention strategies?

Material and Methods

Twenty three cases of obsessive compulsive neurosis treated at Behaviour therapy unit of the Institute of Psychiatry, Madurai Medical College, Madurai formed the material for analysis. Thought stopping procedure was used in treating them. The measures of therapeutic change included Taylor’s manifest anxiety scale, Beck’s inventory for depression, distress rating on eight point scale, fear survey schedule (Wolpe 1973) and the frequency of obsessions and compulsions. It was observed that in 15 individuals there was marked improvement, in four cases the improvement was minimal and the rest four showed no change. Further details of the outcome and followup can be had from an earlier publication by the same authors (Nammalvar and Venkoba Rao 1983). Analysing them on the factors pointed out by Foa (1979) these three groups are found to have certain distinct characteristics. They are:

Group-I

Obsessive Compulsive States with No Complicating Symptoms:

This group comprised of 15 patients. Only those who showed marked improvement were included in this group. In all these 15 individuals there was good habituation to the Obsessional thoughts. Both within session and between session habituations were observed in this group. For example a patient was disturbed by the thought that she would kill her children. In the first session she reported an anxiety of 7 points while recollecting the thought. But as the session proceeded there
was a reduction in the anxiety level. Later in therapy she was asked to recollect the disturbing thought, the same item of an impulse to kill the children that elicited a high degree of discomfort in the first session showed no discomfort on the 3rd and subsequent sessions. In a follow up after 6 months duration she reported no period of anxiety or distress in this area. This happened inspite of her children, who were asked to live with her grand-parents were brought back. This is the pattern of response to treatment in all the 15 of the 23 subjects whose recovery was rated as marked.

**Group-II**

*The Obsessive Compulsive State with Over-valued Ideation:*

The Group-II consisted of 4 individuals. All those who had showed minimal change were included in this group. The obsessions in all the four are based on the fear that they contracted some incurable disease from their parents who had really suffered such a disease (e.g.) Mr. A. 34 years old teacher had obsessional fears about leprosy and washing rituals. He believed that he had contracted leprosy from his father, who was suffering from leprosy. Patient reported that his repeated washing and taking bath had helped him to keep away from the disastrous consequences of leprosy. He had reduction in anxiety within a session, i.e., distress decreased as the therapy progressed. But this could be seen only within session. These patients also required repeated reassurance through letters or telephone calls. Subsequently they benefitted only after institution of antipsychotic drugs and electroplexies. Are the obsessions in them manifestations of a schizophrenic process? Little doubt is expressed over an obsession turning into a delusion. Follow-up studies have revealed that 5.3% transit to schizophrenia. However, it can be said that these patients did not have any schizophrenic symptoms. But their obsessions are secondary to a morbid belief that they contracted some disease.

**Group-III**

*The Depressed Obsessive Compulsive State:*

This group comprised of 4 individuals who showed no change. They had associated depressive features such as guilt. This group inspire of their good therapeutic compliance, responded poorly to behaviour therapy. All of them did not benefit from thought stopping. These individuals improved gradually when anti-depressants were started simultaneously. Did these individuals suffer depression manifesting as obsession? Studies reporting the relationship between obsessions and depression did not show conclusive results. Gittelson (1966) in a series of papers reported that obsessions were common in depressive psychoses. The only feature that favoured depression was the presence of guilt and episodic nature of the illness. Although periodicity is a necessary basis for the subgroup, it does not at present seem to be sufficient point for classifying them as suffering from depressive psychoses.

**Discussion**

Thought-stopping, though considered to be effective, has little experimental basis and the modus operandi of the procedure is not known. Current literature emphasizes the cognitive exposures and their habituation. As shown from the above observations habituation to the obsessional thoughts and rituals within sessions and between sessions have been found to be a necessary and sufficient condition for therapeutic success. In a typical obsessive compulsive with no complicating symptoms these two phenomena occur jointly. In the patients with overvalued ideations or
delusions within-session habituation occurred but there was an obvious failure of between-session habituation. In patients with associated depression both within session as well as between session habituations were characteristically absent.

Thompson and Spencer (1966) have considered habituation as “given that a particular stimulus elicits a response, repeated application of the same stimulus results in decrease in the response”. Investigations on response changes during flooding sessions indeed showed decrement of subjective anxiety during prolonged exposure in imagination (Foa and Chambless 1978). The same is true to thought stopping, wherein the obsessional thoughts are exposed in fantasy at shorter intervals. Habituation as a general pre-requisite for therapy may be inferred from the findings of Leader, Gelder and Marks (1966). These authors divide phobic patients into habituators and non-habituators on the basis of diminution of GSR to a series of tones. The habituators showed superior clinical response than non-habituators during desensitization. If the level of arousal at a given moment is low, intrusion of the repetitive stimuli cannot increase the arousal further because habituation is repaid (Leader & Wing, 1966). On the other hand absence of habituation would be expected under higher arousal states (Ketten and Mc Cubbins 1969). Use of relaxation in thought-stopping for Group-I of our sample might have helped for lowering the state of arousal thus facilitating habituation.

A second dimension of between-session habituation involves primarily cognitive operations. It is through this process the short term habituation is retained and consolidated. Patients usually discover that their obsessional thoughts were not as painful as expected. Usually towards the end of each session the subjective distress experienced by the patient become less. Such experiences alter the patients anticipations. Generally it is these cognitive changes that consolidate the within-sessions gains and help for between session habituation. But the patient’s over-valued ideation interferes with the consolidation process. In none of the subjects in Group-II between-sessions habituation occurred. While the mechanism underlying short term habituation is intact in them, the second mechanism of consolidation is blocked because of the cognitive operations in these patients. The cognitive operation (belief systems) might have prevented changes in expectation and conversion of within-session gains to between session habituation. These might have resulted in the absence of therapeutic benefit in between-sessions. A more focussed attempt to change their belief system as well as factors that help to maintain the belief might improve their prognosis.

It is interesting to consider the observations in Group III, the depressed obsessive compulsive group. Here the blockage lies in the short term habituation i.e., within-session habituation itself. It is relevant to point out that depression interferes with learning process. (Seligman, 1974). This group is usually deprived of the novel experience of being free from obsessions even within session. This lack of habituation results in impairment of learning. Two of the four individuals showed dramatic changes when anti-depressant treatment was instituted. Perhaps anti-depressants help to argument the blockage of short term habituation.

It is obvious from the observations that within session habituation occur alone or in combination with between session habituation. But between session habituation cannot occur without within session habituation. For a better therapeutic benefit both these mechanisms are necessary. These two mechanisms involve different areas of the human brain. As noted by Groves
and Lynch "There is mounting indirect evidence which suggest that habituation retained across days involve elaboration by forebrain structures". The within-session habituation which we presume is mediated by the reticular formation (Groves and Lynch 1972). These authors suggest that these two are independent propositions. But we agree with Foa (1979) that "these two are not independent, rather they indicate special kind of dependence" i.e., habituation with in session occurs alone or in conjunction with habituation between sessions”. The former is a prerequisite for the later. Practically a measure of habituation and arousal before institution of thought-stopping procedure might help to screen out those who might cause therapeutic failures. Appropriate pharmacological agents to promote habituation may be valuable in improving the success ratio.

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