

## Depersonalization and Mood Changes in Schizophrenia

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### INTRODUCTION

It has been suggested in a previous paper (Sedman and Reed, 1963) that depersonalization phenomena were most likely to occur in patients with premorbid insecure personalities during a phase of depressive mood. Schneider (1958), includes under the term Insecure Personalities both Anankasts (obsessionals) and Sensitives. In such individuals there is "... a nagging inner uncertainty under various forms of compensatory or over-compensatory activity, especially where the inferiority feelings are of a physical or social character". The purpose of this paper is to examine further the suggested linking of depersonalization, insecure personality and mood change in schizophrenia.

### PROCEDURE

All cases of schizophrenia admitted as in-patients or day-patients between 1 January, 1959 and 1 October, 1962 to the University Department of Psychiatry, Manchester Royal Infirmary, under the care of Professor E. W. Anderson were studied. Diagnostic criteria in reaching a diagnosis were strict and had in all cases been arrived at as a result of intensive case study with final assessment at case conferences held by senior members of the staff. There were 54 cases, 21 males and 33 females, who had at some time exhibited symptoms of first rank importance such as "audible thoughts, voices heard arguing, voices heard commenting on one's actions, the experiences of influences playing on the body (somatic passivity experiences); thought withdrawal and other interferences with thought; diffusion of thought; delusional perception and all feelings, impulses (drives), and volitional acts that are experienced by the patient as the work or influence of others" (Schneider, 1959, p. 133-4). Included

in this number were 7 cases where the diagnosis was doubtful, in that there were unusual features or organic factors. One of the 7 cases was a known epileptic who had developed schizophrenic symptoms; 1 case had undergone a process of "brainwashing" (Sedman, 1961); 1 case had definite neurological signs; 2 cases may have been atypical psychoses of middle life; and finally 1 case, though strongly suggestive of schizophrenia, may have been an abnormal psychogenic reaction. Five cases of schizo-affective disorder were also included in the total. In these not only were definite process symptoms of schizophrenia present, but also definite evidence of an affective disorder with associated "biological" features such as weight loss, early morning wakening, diurnal variation of mood, poor appetite, retardation, etc.

Particular attention was paid to the presence or absence of mood changes, namely depression, elation, loss of affect, incongruity of affect, lability of mood and delusional mood or *Wahnstimmung*. In assessing the latter we were guided by Schneider's clinical description "... delusional perception is often preceded by a delusional atmosphere brought on by the process itself, an experience of oddness, or sometimes, though more rarely, of exaltation..." (Schneider, 1959). We likewise agree with this author that *Wahnstimmung* is often vague and ill-defined but that it can be established phenomenologically by adequate clinical examination. This delusional mood or atmosphere is an integral part of the "trema" according to the "Gestalt" view of schizophrenia (Conrad, 1958). Thus Fish (1961) discussing Conrad's views states, "In many patients there is a general feeling of suspicion which pervades all experiences and leads to the feeling that there is 'something going on'. In the end a delusional

mood occurs in which the environment is experienced as being changed in a strange and threatening way. Conrad believes that there is scarcely a case of early schizophrenia in which this phenomenon does not occur."

The presence or absence of depersonalization was noted, the criteria used being as previously reported (Sedman and Reed, 1963). The previous personality was recorded and assessed according to Schneider (1958). Finally note was made of the duration of the illness, its mode of onset and any EEG findings.

#### RESULTS

Of the 54 cases, 21 were males, 33 females, 27 had an acute onset, and 27 an insidious one. As regards the premorbid personalities of these patients, 15 were adjudged normal, 32 were insecure, 6 were mixed but with strong attention seeking features, and 1 was cyclothymic.

Mood changes were in fact very common in our patients, only 7 exhibiting no mood change at all; 24 showed depression; 8 showed *Wahnstimmung* alone; 7 both depression and *Wahnstimmung*; 4 showed flatness; 1 incongruity of affect; 2 incongruity of affect and lability of mood; and 1 depression and flatness of mood. Duration of the illness is shown in Table II.

In all, 16 patients had electroencephalo-

graphs performed on them, 9 of which were normal, 4 definitely abnormal and 3 doubtfully abnormal. Only 1 of these patients was a known epileptic.

#### (a) DEPERSONALIZATION

In all there were 6 cases of depersonalization (3 males aged 23 years, 49 years, 53 years, their duration of illnesses being 2, 9 and 3 years respectively; and 3 females aged 21 years, 37 years and 40 years, their duration of illnesses being 1, 16 and 5 years respectively). In every case the depersonalization had been present throughout the illness. All the cases had insecure personalities, 5 out of 6 with depression of mood and the other with *Wahnstimmung*. Three cases had an acute onset, the other 3 showed an insidious onset. Electroencephalographs were done in only 2 cases, both being reported as within normal limits.

The relationship between depersonalization and a number of other variables was studied using the Chi square method. (In all cases Yates' correction was used.)

There was no significant relationship between the occurrence of depersonalization and the mode of onset, nor was it related to the sex of the patient.

Depression alone or with *Wahnstimmung* was not of itself significantly associated with the

TABLE I  
Age Distribution in Years

	<20 Years	21-25 Years	26-30 Years	31-35 Years	36-40 Years	41-45 Years	46-50 Years	51-55 Years	56-60 Years	61-65 Years
No.	4	11	5	5	12	3	4	5	3	2

TABLE II  
Duration of Illness in Years

	<2 Years	2 Years	3 Years	4 Years	5 Years	6 Years	7 Years	8 Years	9 Years	10 Years	11 Years
No.	11	7	10	4	6	2	3	0	3	2	0
	12 Years	13 Years	14 Years	15 Years	16 Years	17 Years	18 Years	19 Years	20 Years	21 Years	22 Years
No.	0	1	1	0	1	0	1	0	1	0	1

occurrence of depersonalization,  $p < 0.50$ ,  $p < 0.50$  respectively. Insecure personality alone was also not significantly associated with the occurrence of depersonalization,  $p < 0.20$ .

*The Relationship Between Depersonalization, Insecure Personality and Mood Changes*

TABLE III

	Deperson- alized	Not Deperson- alized
Insecure personality and depression .. ..	5	14
Others .. ..	1	34
$\chi^2 = 4.69$ $p < 0.05$ Significant		

Thus depersonalization occurs more commonly in patients with an insecure personality and depression, the result being statistically significant.

TABLE IV

	Deperson- alized	Not Deperson- alized
Insecure personality, de- pression and/or <i>Wahn- stimmung</i> .. ..	6	20
Others .. ..	0	28
$\chi^2 = 3.85$ $p < 0.05$ Significant		

Again depersonalization is associated with insecure personality, depression and/or *Wahnstimmung* and the association is statistically significant.

(b) THE PREMORBID PERSONALITY

We have already pointed out that the premorbid personalities of our patients were predominantly insecure. There was a significant association between insecure personality and the mode of onset when compared with the normal personalities as shown by the following table.

TABLE V

	Insecure Personality	Normal Personality
Acute onset .. ..	13	12
Insidious onset .. ..	19	3
$\chi^2 = 4.88$ $p < 0.05$ Significant		

Thus the insecure personality was associated more commonly with an insidious onset than an acute one. When however insecure personalities were compared with all the others the result was not significant ( $\chi^2 = 1.92$ ,  $p < 0.2$ ). Insecure personality was not significantly related to the occurrence of depression ( $\chi^2 = 0.07$ ,  $p < 0.80$ ), nor to the occurrence of *Wahnstimmung* ( $\chi^2 = 0.14$ ,  $p < 0.70$ ), nor to the occurrence of depression and/or *Wahnstimmung* ( $\chi^2 = 1.29$ ,  $p < 0.30$ ). There was no obvious relationship between the premorbid personality and the duration of the illness or the age of the patient. Of the patients with abnormal EEGs, 4 had insecure personalities, 1 had a normal personality and 1 was predominantly attention seeking. Of the ones with doubtful abnormal EEGs, 2 were insecure and 1 was normal.

(c) MOOD CHANGES

We have already mentioned the high proportion of mood changes in our group of schizophrenics. These were chiefly depressive, though *Wahnstimmung* was also common. (a) In all the 7 cases exhibiting no mood changes, the illness was of under 6 years duration. (b) Of those showing depression alone, 14 were under 5 years duration, 5 between 5-10 years duration and 5 between 11-22 years duration. (c) Of cases showing *Wahnstimmung* 4 were under 5 years duration, and 4 between 5-10 years duration. (d) Of cases showing depression and *Wahnstimmung* all 7 were under 5 years duration. It is of interest that the 5 cases showing flatness (1 with depression also) were not associated with long duration of the illness for all were under 10 years duration. The mode of onset was not significantly related to any of the mood changes in our patients. Of the patients with abnormal EEGs 2 showed no mood change,

1 showed depression and 1 both depression and *Wahnstimmung*. Of the patients with doubtfully abnormal EEGs 1 showed no mood changes, 1 was depressed and the other showed both depression and *Wahnstimmung*. These results are obviously inconclusive.

(d) THE DURATION AND MODE OF ONSET OF THE ILLNESS

It is reported that the late Professor Mapother regarded acuteness of onset as the most reliable guide to prognosis in schizophrenia. In our patients, 11 cases with an acute onset had a duration of under 2 years, 11 cases with a duration between 2–5 years, 3 between 6–10 years and 2 over 10 years (14 and 16 respectively). On the other hand, of the cases with an insidious onset there were none with a duration of under 2 years, 16 were between 2–5 years duration, 7 6–10 years duration and 4 over 10 years duration. Cases with an acute onset were more likely to have a duration of under 2 years, whereas no case with an insidious onset had a duration of illness of under this length of time. This difference was statistically significant ( $\chi^2 = 18.08$ ,  $p < 0.001$ ). There are several possible explanations of this. Naturally acute schizophrenic illnesses present early, and hence in such a series as this it is evident that there must be a number of cases who had just developed schizophrenia, but this is no guide to the ultimate outcome of the illness. However it also means that schizophrenia of insidious onset is unlikely to be recognized in a period of under 2 years. As regards the cases with a duration of between 2–5 years there was no statistically significant difference between those of acute and those of insidious onset ( $\chi^2 = 1.18$ ,  $p < 0.30$ ). Of those with a duration of 6 years or over there was again no significant difference in respect of mode of onset ( $\chi^2 = 2.22$ ,  $p < 0.20$ ). In other words the data lend little support to Mapother's view. On the other hand no less an authority than Bleuler (1950) considered that the very acute syndromes, especially if there are periodic recurrences, ultimately end in marked deterioration.

As regards the duration of the illness and EEG findings; normal EEGs were found in 1

patient with a duration of under 2 years, 5 patients 2–5 years duration and 3 patients 6–10 years. Abnormal EEGs were found in 4 patients with a duration of 2–5 years and doubtfully abnormal EEGs were found in 3 cases all with a duration of under 2 years. These results are inconclusive. Neither was there any significant relationship between the acuteness of onset and the EEG findings. Of those with an acute onset, 4 patients had normal EEGs, 4 had abnormal EEGs and 2 had doubtfully abnormal EEGs. Of those with an insidious onset 5 had normal EEGs, and 1 had an abnormal EEG. The normals were compared against abnormals and doubtfully abnormals combined ( $\chi^2 = 1.37$ ,  $p < 0.30$ ) and the result was not significant.

CONCLUSIONS

The results tend to confirm the association between depersonalization, insecure personality and depression of mood. Mayer-Gross (1935) had 6 schizophrenic patients in his 26 cases of depersonalization and our results again confirm his view that depersonalization does occur in this illness, but, we would add, only when there is an underlying insecure personality and a specific mood change, namely depression. We do not know whether this was so in Mayer-Gross's patients. Mayer-Gross's view that depersonalization in schizophrenia has a tendency to a long duration is supported, for in each of our cases the symptoms had occurred throughout the illness, without interruption and were still continuing.

Ackner (1954) has drawn attention to the views of various authors, Lewis (1949), Rosenfeld (1947), Galdston (1947), who have suggested that there is a relationship between schizophrenia and depersonalization, e.g. that depersonalization is one of the prodromata or a benign form of schizophrenia.

The high proportion of cases showing depression is not unexpected, for this was noted particularly by Bleuler (1911). Whilst *Wahnstimmung* was also fairly common we were unable to confirm Conrad's (1958) affirmation (q.v.). We cannot agree with Meyer (1957) that depersonalization may later become a schizophrenic ego disorder or a *Wahnstimmung*. For we

see the latter as a mood change and not primarily an ego disturbance. On the other hand we accept that depersonalization and *Wahnstimmung* may co-exist, as they did in one of our cases. In passing we might mention that in one of our non-depersonalized patients, the *Wahnstimmung* preceded a brief period of ecstasy associated with a mystical experience which confirms Schneider's view that *Wahnstimmung* may be associated with exaltation.

We reiterate that the occurrence of an insidious onset was significantly more frequent in patients with a premorbid insecure personality than in those with a normal premorbid personality.

#### SUMMARY

The occurrence of depersonalization in a group of 54 schizophrenic patients has been studied. There appears to be a statistically significant association between depersonalization, depressive mood and insecure personality in these patients.

The findings are discussed briefly in relation to previous viewpoints.

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#### REFERENCES

- ACKNER, B. (1954). "Depersonalization", *J. Ment. Sci.*, **100**, 838-72.
- BLEULER, E. (1911). *Dementia Praecox oder die Gruppe der Schizophrenien*. (Trans. as *Dementia Praecox or the Group of Schizophrenias* by J. Zinkin, 1950, New York: International Universities Press.)
- CONRAD, K. (1958): *Die beginnende Schizophrenie*. Stuttgart: Thieme.
- FISH, F. (1961). "A neurophysiological theory of schizophrenia", *J. Ment. Sci.*, **107**, 828-38.
- GALDSTON, I. (1947): "On the aetiology of depersonalization", *J. Nerv. Ment. Dis.*, **105**, 25-39.
- LEWIS, N. D. C. (1949). "Criteria for early differential diagnosis of psychoneurosis and schizophrenia", *Amer. J. Psychotherap.*, **3**, 4-18.
- MAPOTHER, E. (Anderson, E. W.—personal communication.)
- MAYER-GROSS, W. (1935). "On depersonalization", *Brit. J. Med. Psychol.*, **15**, 103-122. Discussion, 123-26.
- MEYER, J. E. (1957). "Studien zur depersonalization", *Mtschr. Psychiat. Neurol.*, **133**, 63-79.
- ROSENFELD, H. (1947). "Analysis of schizophrenic state with depersonalization", *Int. J. Psychoanal.*, **28**, 130-39.
- SEDMAN, G. (1961). "'Brain-washing' and 'Sensory Deprivation' as factors in the production of psychiatric states. The relation between such states and schizophrenia", *Confin. Psychiat.*, **4**, 28-44.
- and REED, G. F. (1963). "The occurrence of depersonalization phenomena in obsessional personalities and in depression", *Brit. J. Psychiat.* (In press.)
- SCHNEIDER, K. (1959). *Clinical Psychopathology*. 5th edition. (Trans. M. W. Hamilton.) New York: Grune & Stratton.
- (1958). *Psychopathic Personalities*. 9th edition. (Trans. M. W. Hamilton.) London: Cassell.

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