

MULTIPLE PERSONALITY DISORDER PATIENTS WITH A PRIOR DIAGNOSIS OF SCHIZOPHRENIA

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ABSTRACT

The authors collected a series of 236 cases of multiple personality disorder patients reported to them by 203 clinicians throughout North America. The series included 81 patients who had received a past diagnosis of schizophrenia and 96 who had not. The patients with a past diagnosis of schizophrenia were more self-destructive and spent more time in the mental health system prior to diagnosis. During this period they received more other psychiatric diagnoses and treatments. They had more Schneiderian first-rank symptoms but did not have more auditory hallucinations.

Multiple personality disorder (MPD) was considered to be rare up until 1980. At that time 200 cases had been reported in the world literature (Greaves, 1980). Since the publication of DSM-III (American Psychiatric Association, 1980), however, there has been a rapid increase in the number of cases reported. According to one recent estimate 6000 cases of MPD have now been diagnosed in North America (Coons, 1986). Developments in the field have been reviewed well by Kluft (1985a; 1985b; 1987a).

Several authors have commented on the fact that MPD is often misdiagnosed as schizophrenia (Bliss, 1980; Rosenbaum, 1980). Kluft (1987d) has shown that Schneiderian first-rank symptoms of schizophrenia are common in MPD. His series of 30 patients had a mean of 3.6 first-rank symptoms.

Two large series reported by clinicians have been documented. In a series of 100 MPD cases Putnam, Guroff, Silberman, Barban, and Post (1986) found that just under 50% of MPD patients had a prior diagnosis of schizophrenia. In a series of 236 MPD cases we found that 40.8% of patients had a prior diagnosis of schizophrenia. These and Kluft's findings suggest that there is a phenomenological overlap between MPD and schizophrenia. This overlap leads to a misdiagnosis of schizophrenia in many cases of MPD.

The purpose of this report is to compare 81 MPD patients with a past diagnosis of schizophrenia to 96 without such a diagnosis to determine the characteristics that differentiate the two groups.

METHOD

SUBJECTS

Subjects were 236 patients with MPD reported by 203 clinicians throughout North America. Subjects had to meet the DSM-III-R (American Psychiatric Association, 1987) criteria for MPD for inclusion in the analysis.

PROCEDURE

A 36-item questionnaire was mailed to 1729 members of the Canadian Psychiatric Association (CPA) and 515 members of the International Society for the Study of Multiple Personality and Dissociation (ISSMP&D). Each respondent was asked to indicate whether he or she had ever worked with an MPD patient. Those who had were asked to complete the questionnaire on one or more of their recent patients.

The questionnaire obtained information about (a) the training of the respondent and his/her experience with MPD, (b) demographic characteristics of the patient, (c) how well the patient met the DSM-III-R (American Psychiatric Association, 1987) and NIMH (Putnam, Personal Communication, 1986) criteria for MPD, (d) the number and characteristics of the patient's alter personalities, (e) the abuse history of the patient, (f) the previous diagnoses, previous treatment, and criminal activities of the patient, and (g) the number of Schneiderian first-rank symptoms of schizophrenia experienced by the patient.

The series was divided into patients with and without a past diagnosis of schizophrenia. Statistical comparisons of these two groups were then done for all items in the questionnaire. T tests were used to analyze continuous data and chi squares were used for dichotomous data.

RESULTS

A total of 262 cases was reported by 227 respondents. Of these, seven were excluded because of incomplete data. Fourteen cases were excluded because the characteristics of the patient did not meet the DSM-III-R criteria for MPD. Respondents had been asked to report cases of MPD and were asked to state whether the case met each of five NIMH criteria for MPD.

A further five cases were excluded because one or more answers by the respondents relating to the number of cases seen or the number of patient personalities were determined to be statistical outliers ($p < .01$). These outliers were excluded so that the most severely polyfragmented cases did not skew the mean results, and because such cases might have atypical features. It was assumed that respondents who had seen a very large number of cases might have an atypical caseload, so several of these cases were excluded. It was our desire to report data characteristic of the bulk of MPD cases.

Excluding the above cases left a total sample of 236 cases. Of these, 81 had a past diagnosis of schizophrenia and 96 did not. For the remainder the respondent indicated that it was unknown whether there had been a past diagnosis of schizophrenia, or the data were missing.

DEMOGRAPHIC CHARACTERISTICS OF RESPONDENTS

Of the 236 cases, 64 were submitted by 49 members of CPA, 5 of whom belonged to ISSMP&D, and 172 were submitted by 154 members of ISSMP&D. There were no significant differences between these groups of respondents reporting cases with and without a past diagnosis of schizophrenia. This was true for number of cases of MPD seen, number currently in treatment, and year in which the respondent saw his or her first

case. Data showing that there were few differences between CPA and ISSMP&D cases will be reported elsewhere.

DEMOGRAPHIC CHARACTERISTICS OF PATIENTS

Patients in the two groups did not differ in age, sex, marital status, or number of children. The patients with a previous diagnosis of schizophrenia had more first-degree relatives with MPD diagnosed by the respondent (mean of 1.1 relatives [S.D. 1.0] vs mean of 0.7 relatives [S.D. 0.9], $p < .01$). There were no differences in the patients in these two groups in their frequency of experiencing sexual abuse and rape, but patients with a past diagnosis of schizophrenia had experienced more physical abuse in childhood (85.2% vs 65.2%, $p < .005$).

There was no difference between the two groups in percentage of cases that had been hypnotized prior to diagnosis. However more patients with a past diagnosis of schizophrenia have been hypnotized after diagnosis (80.0% vs 67.7%, $p < .04$).

CHARACTERISTICS OF PATIENTS' PERSONALITIES

There was no difference between the two groups in number of personalities identified at the time of reporting. However the patients with a past diagnosis of schizophrenia had twice as many identified alters at the time of diagnosis: 4.4 alters (S.D. 7.8) vs 2.2 alters (S.D. 3.5) with $p < .03$. The mean number of personalities for the entire series of 236 was 15.7.

Of nine types of alter personality enquired about there was a difference between the two groups only for personality of the opposite sex. This type of alter occurred more frequently in patients with a past diagnosis of schizophrenia (68.4% vs 55.8%, $p < .04$). There were no differences between the two groups for their having a child personality, personality of different age, protector personality, persecutor personality, personality identified as a demon, personality identified as another living person, personality of different race, or personality identified as a dead relative.

There were no differences between the two groups in percentages which met each of five NIMH diagnostic criteria for MPD.

NON-MPD PSYCHOPATHOLOGY

There were many differences between the two groups in psychopathology not specific for MPD. In every instance the symptom or behavior occurred more frequently in the group with a past diagnosis of schizophrenia.

These patients spent longer in the mental health system from first presentation to diagnosis of their MPD (8.9 years [S.D. 1.7] vs 5.4 years [S.D. 5.9], $p < .00001$). They also received more other diagnoses during that period (3.9 diagnoses [S.D. 2.2] vs 2.2 diagnoses [S.D. 1.7] $p < .00001$).

As shown in Table 1, the patients with a past diagnosis of schizophrenia had more often been diagnosed as having an affective disorder, personality disorder, anxiety disorder, substance abuse, MPD itself, or somatization disorder.

The patients with a past diagnosis of schizophrenia were more self-destructive. They made more overall suicide attempts (84.8% vs 62.1%, $p < .01$). They had overdosed more often (83.8% vs 62.1%, $p < .008$); inflicted cigarette burns or other self-injuries more often (68.8% vs 46.3%, $p < .003$); and had slashed their wrists more often (62.3% vs 38.5%, $p < .006$).

As shown in Table 2, the patients with a past diagnosis of

schizophrenia had received many forms of treatment more often. These different treatments included inpatient admission, antipsychotic medication, antidepressants, nonbenzodiazepine sedatives, benzodiazepines, lithium, and ECT. The only treatment enquired about that they had not received more often was psychotherapy.

The patients previously diagnosed as schizophrenic had experienced six of eleven Schneiderian first-rank symptoms more frequently (Table 3). These included delusions, made acts, made impulses, made feelings, thought withdrawal, and thought broadcasting. They had not experienced more auditory hallucinations or thoughts ascribed to others, however. The average number of Schneiderian symptoms per patient in the 236 cases was 4.5.

There were no differences between the two groups in rates of being convicted of a crime, experiencing imprisonment, working as a prostitute, or of having headaches. Headache was enquired about because it is a frequent symptom of MPD, occurring in 78.7% of the 236 cases.

DISCUSSION

In a series of 236 cases of MPD, 40.8% had a previous diagnosis of schizophrenia. Putnam et al. (1986) noted a past diagnosis of schizophrenia in just under 50% of a series of 100 cases. Several features differentiate MPD patients who have received a diagnosis of schizophrenia from those who have not. MPD patients with a past diagnosis of schizophrenia are more self-destructive. They spend longer in the mental health system prior to diagnosis, and during this period they receive more other psychiatric diagnoses. They also receive more forms of treatment. Since MPD is often a treatable disorder (Kluft, 1985b), it is important to make the diagnosis and institute specific treatment as early as possible.

Several authors have remarked that a misdiagnosis of schizophrenia in MPD may be due to the patient's auditory hallucinations (Kluft, 1985a; Bliss, 1980). Our data indicate that auditory hallucinations are very common in MPD. The most common Schneiderian symptoms in our series of 236 cases were voices arguing (71.7%) and voices commenting (66.1%). However, it is not the auditory hallucinations that are associated with a misdiagnosis of schizophrenia. It is delusions, passivity experiences, thought broadcasting, and thought withdrawal which distinguish patients who have been called schizophrenic from those who have not.

It is important to emphasize that the two groups in this report (those with and without a past diagnosis of schizophrenia) do not differ in their specific features of MPD. They do not differ in the frequency with which they meet the five NIMH diagnostic criteria for MPD, in number of personalities, or in types of alter personalities. Clinicians should be aware of the features that lead to a misdiagnosis of schizophrenia, in order not to make that diagnostic error.

One caution is necessary in interpreting these findings. Neither of the two diagnoses in question, MPD or schizophrenia, were either confirmed or ruled out using valid and reliable diagnostic instruments. The study suffers from the limitations of questionnaire methodology. However the data are consistent with those of Putnam et al. (1986), and represent the experience of 203 clinicians throughout North America.

Table 1. Previous Diagnoses of MPD Patients

Diagnosis	Past Diagnosis of Schizophrenia %	No Past Diagnosis of Schizophrenia %	p value
Affective Disorder	77.1	59.6	.009
Personality Disorder	71.8	50.5	.02
Anxiety Disorder	51.5	34.7	.01
Substance Abuse	45.2	24.2	.004
Multiple Personality	31.1	10.4	.005
Adjustment Disorder	30.0	23.4	N.S.
Somatization Disorder	29.5	11.7	.002
Organic Mental Disorder	23.0	11.6	N.S.

Table 2. Previous Treatment of MPD Patients

Diagnosis	Past Diagnosis of Schizophrenia %	No Past Diagnosis of Schizophrenia %	p value
Psychotherapy	89.7	88.5	N.S.
Inpatient Treatment	88.8	68.8	.002
Antipsychotic	88.5	36.5	.00001
Antidepressant	87.2	62.1	.0001
Nonbenzodiazepine Sedative	75.0	52.6	.008
Benzodiazepine	58.8	56.4	.0006
Lithium	36.2	12.8	.00001
ECT	20.3	7.5	.05

Table 3. Schneiderian Symptoms in MPD Patients

Diagnosis	Past Diagnosis of Schizophrenia %	No Past Diagnosis of Schizophrenia %	p value
Voices arguing	80.2	70.2	N.S.
Voices commenting	77.6	61.3	N.S.
Delusions	63.0	37.2	.001
Made acts	57.1	37.6	.01
Audible thoughts	56.2	38.0	N.S.
External influences	55.4	40.9	N.S.
Made impulses	54.9	41.9	.03
Made feelings	47.8	29.0	.03
Thoughts ascribed to others	43.8	34.4	N.S.
Thought withdrawal	40.5	22.6	.04
Thought broadcasting	20.0	10.6	.01

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REFERENCES

- American Psychiatric Association (1980). *Diagnostic and statistical manual of mental disorders, third edition*. Washington, DC: Author.
- American Psychiatric Association (1987) *Diagnostic and statistical manual of mental disorders, third edition*. Washington, DC: Author.
- Bliss, E.L. (1980). Multiple personalities: a report of 14 cases with implications for schizophrenia. *Archives of General Psychiatry*, 37, 1388-1397.
- Coons, P. (1986). The prevalence of multiple personality disorder. *Newsletter of the International Society for the Study of Multiple Personality and Dissociation*, 4 (3), 6-7.
- Greaves, G.B. (1980). Multiple personality disorder: 165 years after Mary Reynolds. *Journal of Nervous and Mental Disease*, 168, 577-596.
- Kluft, R.P. (1985a). Making the diagnosis of multiple personality disorder (MPD). *Directions in Psychiatry*, 5 (23), 1-10.
- Kluft, R.P. (1985b). The treatment of multiple personality disorder (MPD). *Directions in Psychiatry*, 5 (24), 1-10.
- Kluft, R.P. (1987a). An update on multiple personality disorder. *Hospital and Community Psychiatry*, 38 (4), 363-373.
- Kluft, R.P. (1987b). First-rank symptoms as a diagnostic clue to multiple personality disorder. *American Journal of Psychiatry*, 144(3), 293-298.
- Putnam, F.W., Guroff, J.J., Silberman, E.K., Barban, L., & Post, R.M. (1986). The clinical phenomenology of multiple personality disorder: review of 100 cases. *Journal of Clinical Psychiatry*, 47(6), 285-293.
- Rosenbaum, M. (1980). The role of the term schizophrenia in the decline of the diagnosis of multiple personality. *Archives of General Psychiatry*, 37, 1383-1385.