A Schedule for Rating Lifetime Psychopathology and Course of Illness

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A SCHEDULE FOR RATING LIFETIME

PSYCHOPATHOLOGY AND COURSE OF ILLNESS

by

Carol F. Kaufman

A Thesis Submitted to the Faculty of the Graduate School of Loyola University of Chicago in Partial Fulfillment of the Requirements for the Degree of Master of Arts

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LIFE

The author, Carol Fuchs Kaufman, is the daughter of Eva (Feldman) Fuchs and the late Sam Fuchs. She was born on December 12, 1937 in the Bronx, New York.

Her early elementary education was obtained in the public schools in Kinston, North Carolina. From the seventh grade through high school she attended school in Miami Beach, Florida, graduating from Miami Beach High School in 1955.

In September, 1955, she entered Brandeis University, Waltham, Massachusetts and attended for two years. During her four semesters there she was placed on the Dean's List for high academic achievement. In September of 1957 she transferred to Barnard College, Columbia University, New York City. In January of 1960 she received a degree of Bachelor of Science with a major in Sociology from Barnard College.

In September, 1978, she entered the Ph.D. program in Clinical Psychology at Loyola University in Chicago, Illinois. During the Spring term of 1982 she was appointed a lecturer and taught Research Methods in Psychology.

In addition to the current research, she has also participated in research concerning the differences in disordered thinking between schizophrenics and other psychotic groups. Her clinical

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experience has focused on adult patients, both as in-patients and out-patients. Her externship was taken at Illinois State Psychiatric Institute in Chicago, Illinois from June until December of 1980. She has been appointed an intern at Michael Reese Hospital, Chicago, Illinois for one year, commencing July, 1982.

She was married to Gerald Samuel Kaufman on December 21, 1957. They are the parents of one daughter and three sons.
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Kraepelin and Bleuler in describing dementia praecox and schizophrenia used the concepts of deteriorating course and poor outcome to describe these disorders. Despite their careful observation of signs and symptoms more current research has shown their conclusions to be lacking in definitiveness. It appears that schizophrenia and psychosis in general are not the discrete entities these early researchers thought them to be. Szasz (1958) made a distinction between concepts which merely name a phenomena and understanding specific features of the phenomena which is the real source of explanation. His distinctions are valid today because current research on psychosis is still struggling with these two levels of understanding. While Kraepelin and Bleuler were excellent describers of psychotic pathology, it appears that the understanding of it is still being sought.

The ultimate question is one of validity: "What are the various forms of psychotic behavior?" The complexity of the issue, however, has forced the process of learning to become mired in problems of reliability. In the absence of ultimate criteria for validating psychiatric diagnosis such as are usually provided by various laboratory tests in other branches of medicine, we are
thrown back on determining its reliability, since degree of agreement between diagnosticians necessarily represents the upper limits of validity (Fleiss, Spitzer, Cohen, & Endicott, 1972, p. 168). We cannot talk about the differences in behavior between a group of schizophrenics and a group of manic-depressives if, in fact, our groups are not made up of schizophrenics and manic-depressives.

What makes the issues of reliable and valid diagnosis so complex? At the present time there is a bewildering array of competing alternative definitions and little to guide one in making rational choices among them.

In the first place, many studies have shown that disordered thinking is not limited to schizophrenics. Harrow and Quinlin (1977) stated that disordered thinking should be conceived of as existing on a continuum with normal thinking and not as a discrete aberration. Carpenter, Heinrichs, and Hanlon (1981) studied the appearance of Schneider's First Rank Symptoms in a group of patients and found that in addition to some (but not all) schizophrenics, they were present in 22% of the manics and 14% of the patients diagnosed as depressives.

Kraepelin believed that demenia praecox was a single disease entity with a deteriorating course. Consequently, poor outcome has become a focus for research attention. But despite the efforts of many, no one has been able to isolate with finality the specific signs and symptoms which inevitably lead to a poor outcome. Kendell
and Brockington (1980) were unable to find discontinuities or natural boundaries which would separate the symptoms of schizophrenics from patients suffering from the affective psychoses. Strauss and Carpenter (1974) suggested that perhaps Kraepelin's sample was skewed. Perhaps he only looked at chronically ill patients and so his results were verifying that chronic was indeed chronic. To complicate matters further, Strauss, Bartko, and Carpenter (1981) and Strauss, Loevsky, Glazer, and Leaf (1981) both pointed out the same outcome can come from different disorders.

The most recent work on outcome is being reported by Carpenter, Strauss and Bartko (1981). They are suggesting that outcome is not a unitary trait but a series of semi-independent systems which must be looked at in toto for the individual patient. Szasz would approve of their interest in the subjective life of the individual and the plea they make for integrating complex sociological, biological and psychological data. They make a distinction between studies which are correct but not meaningful. For them, when data is meaningful it leads to more effective treatments for more people.

In assessing outcome, they found that prior role functioning was the best predictor of outcome in that area. In other words, prior work history was the best predictor of outcome as regards employment. However, employment was also affected to a degree by social relationships, therapy, etc. Hence, they concluded that role functioning is a semi-autonomous unit. They also concluded
that prior hospitalization is the single best (but not good in an absolute sense) predictor of poor outcome. This is an example of Szasz's criticism that to name is not to explain. What is this saying beyond chronic is chronic?

In summary, research has not been able to isolate the factors which distinguish with certainty the attributes leading to a diagnosis of schizophrenia nor is it yet possible to delineate the course and outcome of the phenomenon. The recognized need is to standardize and validate diagnostic criteria, outcome criteria and general methodological procedures (Strauss, 1973; Feighner, Robins, Guse, Woodruffe, Winokur, & Munoz, 1972). The problems span cultures, as Cooper, Kendall, Gurland, Sharpe, Copeland, and Simon (1972) showed when they reported that concepts like schizophrenia were used in a completely different way in different parts of the world.

In recent years, efforts have been made to bring these areas under closer control. Following the suggestions of Hempel (1961), psychiatrists began to employ operational definitions, including the Research Diagnostic Criteria of Spitzer, Endicott, and Robins (1975). The work of Feighner et al. (1972) and Wing, Cooper, and Sartorius (1974) have also influenced the measurement and classification of psychiatric symptoms. In addition, DSM III has received a great deal of publicity as one of the latest attempts to standardize diagnosis.

While all these efforts have helped to remove some of the
error from the diagnosis of various psychiatric disturbance, they have dealt only with the single episode. It is generally true, however, that psychoses recur and that subsequent episodes are not always of the same clinical type as the original one (Cooper, 1967; Carpenter, Strauss, & Bartko, 1981). In limiting study to episodes, symptoms and outcomes can vary widely for the same individual, or conversely, overlap across several diagnostic schema.

It has been shown that elements concerned with the course of illness such as chronicity are more predictive of outcome than are the psychopathological symptom (Helzer, Brockington, & Kendell, 1981). Also, in studying the course and outcome of psychotic illness the effects of various therapeutic treatments can be more accurately assessed. These are all reasons for employing the same rigorous methods in making diagnosis over a span of time as in making a diagnosis for individual episodes. These diagnoses which cover several episodes and the intervals between them have been termed "lifetime diagnoses." They do not, in fact, apply to a lifetime but to the time between the first onset of symptoms and the last contact with the patient. Research into the development of lifetime diagnoses requires that all three elements are determined precisely—namely, the immediate state, the episode, and the diathesis, or liability to mental illness from which a patient suffers.

The present project has been designed to develop a schedule for lifetime diagnosis and severity ratings over a span of time. The
study period may contain several episodes of illness. In addition there will be a diagnosis of the diathesis which subsumes a chronic or recurrent disorder. The aim of an instrument designed to study the course of psychiatric illness is to nominate and quantify all the aspects of the clinical state over a period of time. This includes the presence and severity of symptomatology as well as general outcome measures such as duration of hospitalization and social adjustment.
CHAPTER II

REVIEW OF RELATED LITERATURE

Development of Reliable Instruments for Measuring Episode Diagnoses

In developing reliable instruments for measuring episode diagnoses, researchers have attempted to strike a balance between objectivity and standardization on one hand and complexity and clinical relevance on the other. The need for objectivity and standardization is obvious. Many studies reported that clinicians differ on what they see and the relevance they attach to it. In addition, diagnostic categories are often poorly defined (Beck, 1962; Ward, Beck, Mendelson, Mock, & Erbaugh, 1962; Spitzer, Fleiss, Burdock, & Hardesty, 1964; Spitzer & Fleiss, 1974; Saghir, 1971; Strauss & Carpenter, 1974). Kendell (1968) found that bias becomes a greater problem as clinicians become more experienced. Older, more experienced clinicians were more influenced by their personal expectations and diagnostic preferences and less by the actual clinical data than were younger, less experienced clinicians.

Research has attempted to overcome these difficulties. One of the more widely used structured interviews for determining an episode diagnosis is the Present State Exam (PSE), developed by Wing (1970). The patient is interviewed regarding his present state and his state during the previous month. The 500 questions are
directed toward specific symptoms and behaviors. However, the PSE is not a questionnaire. It has been described as a clinical guide, enabling a thorough examination of psychopathology. The interviewer may use flexibility in probing for answers but definite suggestions are provided. The expectation is that upon completion of the interview he will be able to make an episode diagnosis according to assessments established by Schneider and his First Rank Symptoms. In an ultimate gesture to precision, Wing also developed a computer system, CATEGO, to make episode diagnoses.

An assessment of reliability is one measure of an instrument's value. One way of describing reliability is that it measures the amount of error variance. As error variance is reduced, reliability is increased and the variation remaining is more likely a reflection of true differences. Downing, Francis and Brockington (1981) reported a mean inter-rater reliability score for the PSE to be a kappa score of .73. The test-retest mean reliability score was .41. The time between tests was only a few days so a score this low cannot be reasonably attributed to a gross change in the clinical state of the patient. There is variation in the most stable clinical picture but that low a figure must in part be due to certain inadequacies in the instrument itself. Observations of disordered and idiosyncratic speech, ambivalence, autism, flat, inappropriate affect, and looseness of association were the least reliable (Luria & McHugh, 1974). These are characteristics which contribute heavily to decisions regarding a diagnosis of schizophrenia. However, other
researchers using other criteria, also reported rather low inter-rater reliability figures for diagnosing schizophrenia (kappa of .50 for Helzer, Robins, Taibleson, Woodruff, Reich, & Wish, 1977 and .57 for Spitzer & Fleiss, 1974).

Another popular interview schedule is the Schedule for Affective Disorders and Schizophrenia (SADS) developed by Endicott and Spitzer and first reported in 1978. Like the PSE, the SADS is dependent on the capacities of the patient to cooperate with the investigator and understand the questions. The SADS was developed specifically to enable the clinician or researcher to obtain the information necessary to make a diagnosis according to the Research Diagnostic Criteria (RDC). These criteria were developed by Spitzer, Endicott and Robins (1978).

The RDC were developed to enable clinicians to use standardized inclusion and exclusion criteria in summarizing patient data into psychiatric diagnoses. Inadequacies in nomenclature have been the largest source of low reliability (Ward, Beck, et al., 1962). The use of the inclusion and exclusion criteria should enable clinicians and researchers to select relatively homogeneous groups of subjects who meet specified diagnostic criteria. In addition, the RDC are readily understandable in clinical terms.

Endicott and Spitzer (1978) reported inter-rater reliabilities for the SADS at 90% being .60 or better and 82% were .60 or better for the test-retest reliability scores. This improvement over the
PSE was substantiated by independent research (Brockington, Kendell, & Leff, 1979; Bland & Orn, 1979; Kendell & Brockington, 1980).

However, none of these instruments for making an episode diagnosis appeared capable of capturing the complexity of psychiatric pathology. "There are few psychiatric diagnoses that may be made simply on the basis of cross sectional mental status findings" (McCabe, 1976, p. 575). Florid symptoms often masked affective psychoses although at the time of the diagnosis the disorder appeared to be schizophrenic. McCabe compared acute schizophrenics in St. Louis with reactive psychosis in Denmark and found the clinical pictures to be almost identical. Diagnosis was also a poor predictor of social outcome and only somewhat better at predicting symptomatic outcome (Kendell, Brockington, & Leff, 1979). Such findings have led some researchers to step back from the episode to take a broader look at psychotic pathology.

The Value of Lifetime Diagnosis

Wing, Birley, Cooper, Graham, and Isaacs (1967) described their work with the PSE as "static." They compared this to the dynamic approach of clinicians which includes many factors—social, psychological, and biological. Developing a way of charting diagnoses over time is an attempt to bring some standardization and objectivity to these many factors. This is the goal and value of lifetime diagnoses. While being more complex and therefore more difficult to quantify, bringing together these multiple factors brings research
findings closer to the level of human functioning. Strauss, Bartko and Carpenter in their most recent writings describe such work as more meaningful. They describe meaningful as leading to more effective treatment for more people.

Endicott, Spitzer and Robins in establishing the RDC put a primary importance on precise and reliable diagnosis. In considering the question of false-positives (those diagnosed as schizophrenic while not actually being so) and false-negatives (those not diagnosed as schizophrenic who are in fact schizophrenic), they felt that it was more important to err on the side of caution. This meant that many schizophrenics who did not precisely fit the criteria would be classified as "other psychiatric disorder." Carpenter, Strauss and Bartko (1981) were concerned that precision in diagnosis was associated with a misleading confidence as to the implications of the diagnosis. Sharp distinctions of schizophrenia based on cross-sectional signs and symptoms provide the basis for precise and reliable diagnosis, "however, we do not believe that diagnoses derived from a narrow descriptive base are generously informative on the broad range of human functioning vulnerable to impairment in the course of schizophrenic illness" (p. 948). They also questioned the assumption often implicit in precise episode diagnosis that affective disorders account for illnesses in patients who meet broad and ill-defined criteria but not narrow, precise criteria for schizophrenia.

Carpenter et al. (1981) stated that the developers of the RDC
and the SADS disregarded relevant information not contained in the criteria for the sake of clarity of communication. According to Downing, Francis, and Brockington (1980), a single one-hour interview identified only 47% of items present when all sources of information were used and only 63% of the pathology present. Downing also quoted from a 1976 study by Carpenter, which showed that a comprehensive assessment based on all information obtained in the course of a month revealed 30% more psychopathology than the research interview and twice as much in the area of observed signs.

Helzer, Brockington and Kendell (1981) were unable to find any set of cross-sectional criteria that predicted poor outcome at 5 years. They concluded that no matter how floridly ill a patient is at one point in time, that patient does not necessarily have a chronic illness. Therefore, neither presence nor severity of a particular symptom is an adequate basis for diagnosis. Furthermore, Carpenter and Strauss (1975) found that 40% of schizophrenics in a sample were in the best outcome group, so not all schizophrenics have a deteriorating course of illness.

Other studies reported an inability to predict course and outcome from episode diagnosis. Tokor (1968) described patients who were depressive only between episodes. Brockington, Kendell and Wainwright (1980) were unable to assign patients to sharply defined classes of schizophrenia and affective illness. "Even discriminant function analysis and canonical variate analysis, which are methods of maximizing the separation of groups, failed to show any line of
demarcation between the schizophrenic and affective poles" (p. 674). Cooper (1967) studied 293 patients during four hospital admissions and found that only 37% retained the same diagnosis throughout the four admissions. Some developed a different mental illness unrelated to previous ones. Others showed a changing clinical picture due to the natural progression of an illness through different stages. For the third group, changes were due to artifacts of the system rather than clinical changes. Different psychiatrists elicited different samples of a patient's behavior or used terms belonging to different systems of classification. Cooper concluded that most of the changes were due to this third point. "Actual clinical observations must be elicited and recorded in a standardized manner before hospital statistics can be obtained which will give reliable information about the clinical state of patients" (p. 139).

An approach which measured an illness over time would improve the reliability of diagnosis for all these studies. Robins (1978) suggested further that a lifetime diagnosis would help to separate the causes of the disorder from the causes of chronicity. Course and outcome are no longer linked inevitably to diagnosis, but to say that is not to explain how they are connected. We do see changes over time, but what led to them?

Tsuang, Woolson, Winokur, and Crowe (1981) followed 525 patients for 30-40 years. Unfortunately, their study compared only original diagnosis and final diagnosis without noting possible intervening
changes. For schizophrenics, 92.5% had this diagnosis at both points. This figure might be inflated, however, because it included only patients for whom the authors had records for the entire time of the study. Perhaps this limited their findings to chronic schizophrenics. For affective disorders, the stability coefficient was 78.5%. The authors were unable to explain why this figure was lower than for schizophrenics. However, figures this high are interesting, particularly in light of the long length of intervening years. A study which combined their methodology with details about the course of illnesses using a more descriptive clinical approach could undoubtedly answer many of the questions which have been raised in this paper.

The schedule developed in the present research would permit such a study. However, the attempt to measure several dimensions over a period of time presents several complex problems.

Issues To Be Addressed in Developing a Schedule for Charting Psychotic Illness Over Time

The approach here is to aim for clarity and precision and to avoid reducing the range of human functioning which is observed. Psychotic illness can have lifelong implications which must be observed in a way which approximates the subjective life of the patient. Bartko, Carpenter, and Strauss (1981) suggested that we can attempt to quantify behavior without speaking in absolutes. Syndromes should no longer be considered as mutually exclusive of
one another. For example, Goplerud and Depue (1978) reported on growing evidence that bipolar depressive illness is frequently misdiagnosed as acute schizophrenia. Toker (1968) quoted Karl Abraham:

"Careful observation spread over a long period of time shows that . . . the one condition shades off into the other, whereas first we saw an absolute cleavage between the two" (p. 352).

Bartko et al. (1981) suggested the use of a confidence level for diagnosis as a way of balancing the clarity of systematic data collection with the complexity of clinical judgment. This confidence level was based on the presence or absence of a total of 12 signs and symptoms which, in the data collected by the International Pilot Study of Schizophrenia, proved to be the most highly discriminating between schizophrenics and non-schizophrenics. The higher the number of symptoms a patient possessed, the greater the confidence that he was schizophrenic. Patients can be compared on presence or absence of symptoms as well as patterns of severity.

Strauss et al. (1981) pursued the area of classification beyond that of a labeling system by considering a multiaxial system based on the systematic consideration of the biological, psychological and social components of psychiatric disorders. "The existence of a number of axes in a diagnostic system suggests that no single characteristic or area of inquiry is sufficient for classifying, understanding, or, probably, for treating or preventing the disorders involved" (Bartko et al., 1981, p. 941). Similar thinking has gone into the development of DMS III, which now recommends diagnoses to
be made on the basis of information on five axes.

The patient is not capable of providing the data which is now necessary. Downing et al. (1980) stated that 25% of all psychiatric patients at admission are unable to provide data about their condition. Wild, Shapiro and Abelin (1974) reported that only 21 of 90 patients cooperated in a study of schizophrenia. Several articles report that other sources of information were reliable and valid additions to information from patients (Thompson, Orvaschil, Prusoff, & Kidd, 1982; Vernon & Roberts, 1981; Tsuang, Woolson et al., 1981; Downing et al., 1980; Wild, Shapiro, & Abelin, 1974). Data is being accumulated which will designate which sources are best for which types of information. For example, Downing et al. (1980) found that next of kin are good for ratings of incompetence, manic and social behavior.

Earlier research on episode diagnoses tended to emphasize positive symptoms and minimize deficit symptoms. It is hoped that an emphasis on multi-dimensional etiology, course and outcome will present a more balanced picture. One optimistic sign is that of Carpenter, Strauss and Bartko's flexible system of classification where three signs are noted for their absence, early waking, depressed faces, and elation (1981).

One of the most perplexing problems in charting illness over time is the problem of intercurrent events and treatment. Ideally one would wish to study the natural history of a psychosis. This
has always been something of a chimera because even in the 19th century when there were no effective drugs, the social response to disease (e.g., committal to hospital) may have had profound effects on its "natural" history. Both social events and iatrogenic influences may be important, but it is almost impossible in an individual patient to assess their effect on symptoms. The patient lives in a maelstrom of events and his doctors often deploy multiple simultaneous interventions in an effort to help him. Describing the natural history of a psychosis, therefore, is not a realistic aim. All that can be done is to describe the actual course, and to record events and treatment which may have influenced it.

Attempts to Systematically Study Lifetime Diagnoses

To date there have been only a few attempts to develop a method for systematically studying lifetime diagnoses. One of the earlier studies was the US-UK Diagnostic Project conducted in New York City and London, England (Cooper, Kendell et al., 1972). Every patient received a structured PSE and extensive historical data were also obtained both from the patients themselves and their relatives. Those diagnosed as having some form of functional psychosis, mainly schizophrenic and affective psychoses were followed up in 1972 and 1974. The follow-up interviews used a semi-structured schedule incorporating ratings of symptomatology and social adaptation throughout the follow-up period. In some cases, relatives and general practitioners were contacted and the notes of all admissions to psychiatric hospitals during the follow-up period were also
studied. Final diagnoses were based on independent clinical judgments but without standardized rules.

Brockington, Kendell, Wainwright, Heller, and Walker (1980) have attempted to derive indices of the pattern of illness which measure certain parameters of the course of the illness, but these also lacked systematization. Spitzer and Endicott (1978) have developed a lifetime version of the Schedule for Affective Disorders and Schizophrenia, but this is based on an interview which focuses on differential diagnosis and does not involve a procedure for systematically reviewing all the information about a patient's illness.

Another example is the International Pilot Study of Schizophrenia (IPSS) being conducted by the World Health Organization (WHO). They have collected enormous amounts of data. Hundreds of ratings were made on each occasion by a single field worker. Some centers complained that the schedules were too long and it was difficult to hold the attention and cooperation of patient and relatives (WHO, 1979). It is not clear how all these ratings are going to be condensed and used.

Carpenter and Strauss were the American participants in the IPSS and, presumably, used the WHO interview methods but they developed their own outcome measures. At the two year assessment, they used four measures--duration of hospitalization, social contacts, employment during the year before evaluation and symptom severity during the month before assessment, and they had a total outcome
score which was the sum of these. They studied the reliability of these measures, which ranged between .87 and .96, and their intercorrelation, which ranged between .20 for hospitalization and social contact to .63 for social contacts and absence of symptoms. They did not consider these levels of intercorrelation high enough to justify a unitary measure of outcome, but rather several "open-linked systems," each affected by a general factor and also by variables specific to it alone. At the five year assessment, they added several other outcome measures, namely quality of social contacts, quality of life and overall level of function. These had a reliability ranging from .73 to .95. They calculated the correlations between them in 61 patients, and found coefficients ranging from .21 (basic needs and quantity of social contact) to .90 (overall outcome and fullness of life) (Strauss & Carpenter, 1974, 1977).

This research has demonstrated the complex nature of outcome characteristics and their predictors. Generalization of findings has been limited by methodological problems such as relatively short term follow-up and the use of information without systematic rules. The value of these efforts, however, is that they have shown that a long term view of psychotic illness is both feasible and valuable.

Present Project

The development of a schedule for measuring the course and outcome of lifetime psychopathology was the goal of the present project. The knowledge obtained from such a schedule should
ultimately improve the validity of research projects and clinical judgments regarding all phases of psychopathology. The approach was highly dynamic with sections covering behavior before the onset of illness, during episodes and the intervals between episodes. The focus was upon the individual and how he functioned in all his life roles and situations.

Recognizing the multitude of people with whom the mentally ill come into contact and their varying degrees of training and approach, this schedule should be useful and useable by all of them. The information is available by episode and by symptomatology which should also widen the use made of it. Admittedly utopian, the approach was at once standardized and flexible.

Hospital records were a mine of information and every effort was made to make systematic use of this wide range of information. They held information from research protocols, family members and patient observation and response. In contrast to the SADS-L, it was not necessary to have the patient being studied actually present. This is particularly useful in research situations where excellent records have been kept on many ex-patients. The present schedule can then serve as a means for summarizing a huge data base so that patient groups can be meaningfully compared.

For this type of study the data can come from three sources: interviews with the patient, interviews with those nearest to him or her, and professional records. Each source of information has
its own limitations. The patient may be ill at the time of the interview, and communication may be grossly impaired. Even if she or he is well enough to cooperate, he or she has forgotten important aspects of previous episodes, or his or her condition during intervals (Jankins, 1979). Obviously, information given by individuals who are or who have been psychotic must be treated with some reserve and must be corroborated.

Unfortunately, it is often difficult to find and to interview a close relative. It is not known from empirical studies what particular contribution an interview with a close relative can make to a longitudinal assessment, but it seems likely that a relative could give particularly valuable information on the contrast between episodes and intervals and on social functioning. Thompson, Orvaschel et al. (1981) reported that increasing the number of informants increased the accuracy of family histories, thereby making them valuable to a fuller understanding of the patient. Other studies likewise reported on the value of family histories (Vernon & Roberts, 1982; Tsuang et al., 1981; Downing et al., 1980; Wild et al., 1974).

The third source—the hospital records—are theoretically the best source of all, because they record events and statements made at the time of each episode. Unfortunately, they are also not distortion-free. Katz, Cole and Lowery (1969) from a set of six studies concluded that disagreements among clinicians may be due to actual differences in their perceptions of certain kinds of pathology. They found that ethnic backgrounds, age and past experiences
influenced symptom perception among psychiatrists and psychologists making diagnoses based on their own observations. Ratings of apathy, retardation, perceptual disorganization and affect in general showed the lowest inter-rater reliability. Apathy and perceptual disorganization are crucial for ratings of schizophrenia and these were the least reliable. In addition, hospital reports are largely in the form of psychiatric jargon (e.g., delusions and hallucinations) which have shifting meanings. Some sources, e.g., social work reports, are relatively free of these distortions and often are the best report of what actually happened. Also, hospital records tend to distort the most dramatic and severe phases of an illness. It becomes impossible to obtain from any source vital data on the degree of recovery and interval symptomatology.

Each episode should be recorded in detail and symptoms recorded verbatim and not converted into masses of numerical ratings. However, no body of data includes serial psychiatric assessments of each or even more than one episode of illness. The conclusion must be that nosological work, at present, is carried out on data of rather poor quality.

There was a great deal of complex material for each subject in the study. There was a vast difference between rating a single interview and rating records which may be several inches thick. There were logistic problems in assembling the data. Once assembled, it took hours to read through it. Since some of the reporters were unskilled, they used terms in different ways and their accounts
conflicted. The rater had to use judgment on which to believe and consequently reliability is bound to be lower than when a single high quality source is rated. For this reason at least two raters must be used. One of the issues, therefore, was whether to prepare a summary of the data. This has the disadvantage of involving arbitrary selection from the primary material, but the advantage that many raters can focus their attention on a concentrated source of tolerable length.

A summary of the data was considered necessary for the purpose of designing the ratings in this schedule. On the basis of these ratings, other experts should be able to devise summary ratings which would suit their different purposes. If the ratings are both reliable and valid, they should reflect the actual clinical data despite the various levels of recording (original hospital records, summaries, ratings) they have undergone.

Consequently, not only the presence and peak severity of symptoms were of interest, but also the degree of recovery and chronicity of symptoms. Insofar as they reflected the overall severity of the psychotic process, it was relevant to measure the duration of hospitalization and various aspects of social handicap; and it was necessary to record the occurrence of factors which may influence symptomatology, including intercurrent events and treatment. Thus, the aim of this "lifetime" or "longitudinal" psychopathology schedule was to nominate and quantify all aspects of the clinical state over a period of time.
CHAPTER III

METHOD

Subjects

The data were derived from the hospital records of 50 patients. The records consisted of 10 from Manchester, England, who were studied as part of an investigation of puerperal psychosis or other psychotic women who served as controls (Brockington, Cernik, Schofield, Downing, Francis, & Kielan, 1981). The other 40 were selected from a series of over 200 patients' records studied intensively at the Laboratory of Biological Psychiatry at the University of Chicago. They were chosen because of their complexity and interest, and were mainly suffering from schizophrenia or schizoaffective states. Follow-up examinations about one year after the last hospitalization were a part of each record. In total, there were 19 males and 31 females with an average age of onset of 21.6 years, with a range of 18-36 years. The length of the study period on which the lifetime diagnosis was made was calculated from the time of onset of the first episode until the last contact with the patient. For this sample, the average length of the study period was 2,563 days with a range of 255-8,070 days.

Raters

Two raters were used. One was a British psychiatrist who had
developed earlier forms of the schedules. The second rater was an American doctoral candidate in clinical psychology. Training was done by using the 10 British cases. The 10 sets of ratings were done independently and then compared and discussed.

Procedure

Each rater prepared 25 case summaries of approximately 5,000 words and then shared this information so that ratings of each patient's history was done from identical data. The original 10 British cases used for training the raters were rated on a fourth version of the schedule supplied by the British psychiatrist. Discussion followed of difficulties encountered, items seldom rated, low reliabilities, ambiguities present, and data not rated. On the basis of these discussions, a fifth version of the schedule with 176 items and scales was developed.

The entire complement of 50 cases was then rated independently by both raters on the fifth version. Two indices were derived for each variable: the number of patients in whom the item was agreed present and its inter-rater reliability. The variables were again reviewed and many discarded as seldom rated, or clearly not useful. The sixth version of the schedule is the result of this pruning, with 112 items and scales remaining.

Measures

Structure of the Schedule. For each patient, his hospital record was condensed into a 5,000 word summary. This summary of the
patient's life and psychiatric history dealt with childhood and personality factors, intervals and life events as they occurred, and the patient's lifestyle and psychiatric status at the end of the study.

The purpose of the summary was to condense a large volume of information from many sources into a concentrated but graphic descriptive statement which could be reviewed easily. The summary retained the original descriptions of salient symptoms and incidents in the patient's or observer's own words.

At the beginning of the schedule, there was space for a synopsis; here the raters made notes on the patient's life and the relation of events to episodes. They then completed a separate sheet for each episode. No ratings were made, but the main dates were recorded together with the context, clinical features and degree of recovery, and an episode diagnosis. The pages which followed dealt with ratings of onset and course, morbid ideas, auditory hallucinations and passivity phenomena, other psychotic symptoms, manic symptoms, depression and anxiety, the overlap of symptom groups, social functioning, possible aetiological factors and response to treatment. Finally in the sixth version, the rater made three diagnoses—according to DSM III, according to the 9th Revision of the International Classification of Diseases and according to his own personal opinion (See Appendix A for copies of the fifth and sixth editions).

Statistics. For dichotomous judgments, ratings were compared
for agreement between the raters using the Kappa statistic developed by Cohen (1968) and modified by Fleiss (1970) for rating instruments. The formula was a ratio of how well raters actually did after discounting chance agreement. This was a more stringent way of calculating inter-rater agreement than an overall percentage figure. According to Andreasen (November, 1979), .5 or better is an acceptable kappa rating. Statistical significance was not considered as even low kappas can be statistically significant yet not clinically valuable. The extent of clinical value is related to the "degree to which a psychiatrist depends on a diagnostic label in the actual clinical decision making" (Beck, 1962, p. 213).

Sanson-Fisher and Martin (1981) made certain recommendations as to how a methodologically adequate assessment of reliability should be undertaken. Their recommendations which were adapted to this study are as follows:

1. "Given the impact of complexity on reliability, raters should be trained to satisfactory levels of agreement using material similar to that which they are likely to encounter in the investigative stage of the study.

2. Since feedback by the principal investigator about the desirability of obtained ratings may influence reliability, comments by the researchers should be limited to the accuracy of ratings. No comments should be made which may indicate the direction in which it is hoped the results will go.

3. Because of the variation in levels of agreement which can be obtained using different units of data as the base for reliability assessment, it is recommended that agreement should be calculated on the smallest unit of data which is to be used in subsequent analyses.
4. As a result of the spurious influence of sample size and scale range on reliability estimates, chance-corrected statistics such as kappa should be used whenever there is a probability of chance agreements." (p. 143)

An arbitrary cut-off point for the definition of unacceptably low reliability was not established. A flexible and tolerant approach was considered to be more useful after taking several factors into consideration.

1. The establishment of a schedule for measuring the course and outcome of lifetime diagnoses is in the very first stages. To establish a rigid approach to reliability at this point might cause the elimination of clinically useful items.

2. The two raters were from different nations and disciplines. Several studies have demonstrated that British raters have a higher threshold for rating pathology as well as a more restricted view of schizophrenia than their American counterparts (Cooper, Kendell, Gur-land, et al., 1972; Kendell, Cooper, Gourley, & Copeland, 1971). This factor alone might have lowered reliability figures from otherwise clearly acceptable levels.

3. Every attempt was made to be as methodologically sound as possible. For example, the Kappa statistic was used, the recommendations of Sanson-Fisher and Martin were followed and every decision to use variables with low reliability was preceded by a thorough discussion of its relevance.
4. Changes made in the sixth edition should raise reliability figures and can be empirically verified in future studies.
CHAPTER IV

RESULTS

Reliability figures for the entire schedule showed a great deal of variation and can be most meaningful analysed by examining them grouped according to the major concepts studied.

Measures of Onset and Duration

Table 1 shows the reliability of eight ratings in this area. When considering the duration of an illness, one can either express it in absolute terms (e.g., 133 days) or use some time period as a denominator. If one uses actual time, it will tend to increase with age. Using age as a denominator ignores the fact that psychoses rarely begin before 15 years. "Age minus 15 years" would be a satisfactory denominator. The alternative, used here, is the duration of the study period, i.e., from the first symptom of the first episode until the date of last contact. This proves to be a reliable measure, $\tau(48) = .92$, with only occasional disagreements arising in patients with an insidious onset or ambiguous first episodes (e.g., admission to a medical ward with nervousness and palpitations).

The enumeration of admissions is a precise measure, but an imperfect index of the number of episodes. Transfer to another mental hospital, or a day hospital, or a general hospital was
## TABLE 1

Measures of Onset and Duration of Mental Illness

<table>
<thead>
<tr>
<th>Variable</th>
<th>Reliability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Duration of the Study Period</td>
<td>$r = .92$</td>
</tr>
<tr>
<td>Age of Onset of the First Episode</td>
<td>$r = .89$</td>
</tr>
<tr>
<td>Number of Admissions</td>
<td>$r = .97$</td>
</tr>
<tr>
<td>Number of Episodes</td>
<td>$r = .81$</td>
</tr>
<tr>
<td>Time Spent in Hospital</td>
<td>$r = .96$</td>
</tr>
<tr>
<td>Duration of Episodes</td>
<td>$r = .66$</td>
</tr>
<tr>
<td>Rapidity of Onset: Less than 10 days</td>
<td>$r = .88$</td>
</tr>
<tr>
<td>More than 6 months</td>
<td>$r = .73$</td>
</tr>
</tbody>
</table>

$r = \text{coefficient of reliability}$

$k = \text{kappa statistic}$
considered part of the same admission, but discharge even for one
day was the end of the admission even if the patient was readmitted
with the same episode. Admission to a general hospital with psychi-
atriac symptoms or resulting from them (e.g., fractures following a
suicidal leap) counted as a psychiatric admission. Enumerating
episodes was also quite reliable, $r_{(48)} = .81$, the main problem
being the threshold for distinguishing illness from minor affective
and neurotic symptoms. An episode was counted when a patient either
had a justifiable admission to mental hospital, or suffered a dis-
turbance lasting at least two weeks and it was accompanied by a
psychotic or biological symptom or by self-injury. A fresh episode
could start during the same admission either if there was a marked
change in symptoms or the patient recovered and remained well for
two weeks. Discharge from hospital because of improvement was re-
garded as the end of the episode even if there were residual symp-
toms. If, however, there was no significant change in the level of
symptoms, a single continuous episode equal in duration to the study
period was rated. These difficulties are reflected in the compara-
tive unreliability of the rating "duration of episodes", $r_{(48)} = .66$,
which is much less reliable than the "duration of hospitalization",
$r_{(48)} = .96$.

The rapidity of onset strictly means the interval between the
onset of the first symptom and full development of the illness. In
practice the second marker is even harder to determine than the
first. In most cases the raters took the easy path and equated it
with admission to hospital; thus, "rapidity of onset" became "duration of symptoms before admission." In this form it is not necessarily a measure of "acuteness." Symptoms may remain untreated for a long time because they are not obtrusive (e.g., the autism found in hebephrenia), or because of factors related to hospitalization. Direct measurement of rapidity of onset in days proved unreliable, \( r(48) = .37 \). When, however, the patients were divided into three groups, with onset less than 10 days \( (n = 10) \), between 10 days and 6 months \( (n = 27) \) and over 6 months \( (n = 13) \), this crude subdivision proved to be highly reliable, \( k = .88 \) for acute, and .73 for insidious. This rating also overcomes the difficulty of variable acuteness of different episodes, since one can count the number with acute and insidious onset. Much time was spent laboriously assessing the rapidity of recovery, mainly from the daily nursing records. This was very difficult because the change was often gradual and sometimes fluctuating. When the reliability was found to be modest, \( r(48) = .59 \), it was decided that the potential usefulness of the measure did not justify the effort.

**Measures of Psychopathology**

The principles of lifetime symptom rating are similar to those of episode symptom rating, except that the time base is different. Only 35 symptoms were finally used in the sixth edition of this schedule. They are listed in Table 2 except for eight which were modified after the rating exercise, so that their rates of occurrence and reliability are unknown (explanatory ideas associated with
### TABLE 2

**Items of Psychopathology**

<table>
<thead>
<tr>
<th>Variable</th>
<th>Present</th>
<th>Severe</th>
</tr>
</thead>
<tbody>
<tr>
<td>N</td>
<td>K</td>
<td>N</td>
</tr>
<tr>
<td>Guilt</td>
<td>19</td>
<td>.37</td>
</tr>
<tr>
<td>Ideas of grandeur</td>
<td>24</td>
<td>.63</td>
</tr>
<tr>
<td>Ideas of reference</td>
<td>20</td>
<td>.38</td>
</tr>
<tr>
<td>Ideas of persecution</td>
<td>25</td>
<td>.47</td>
</tr>
<tr>
<td>Depressive auditory hallucinations</td>
<td>8</td>
<td>.30</td>
</tr>
<tr>
<td>Hostile, commanding voices</td>
<td>24</td>
<td>.50</td>
</tr>
<tr>
<td>Voices commenting, discussion</td>
<td>15</td>
<td>.56</td>
</tr>
<tr>
<td>Passivity phenomena</td>
<td>13</td>
<td>.33</td>
</tr>
<tr>
<td>Delusions of influence, possession</td>
<td>10</td>
<td>.38</td>
</tr>
<tr>
<td>Hallucinations of taste, smell</td>
<td>6</td>
<td>.47</td>
</tr>
<tr>
<td>Tactile, somatic hallucinations</td>
<td>9</td>
<td>.61</td>
</tr>
<tr>
<td>Visual hallucinations</td>
<td>11</td>
<td>.41</td>
</tr>
<tr>
<td>Confusion, perplexity</td>
<td>15</td>
<td>.41</td>
</tr>
<tr>
<td>Depersonalization</td>
<td>6</td>
<td>.35</td>
</tr>
<tr>
<td>Self-mutilation</td>
<td>4</td>
<td>.56</td>
</tr>
<tr>
<td>Catatonia</td>
<td>4</td>
<td>.33</td>
</tr>
<tr>
<td>Blunting of affect</td>
<td>10</td>
<td>.27</td>
</tr>
<tr>
<td>Apathy, loss of volition</td>
<td>4</td>
<td>.32</td>
</tr>
<tr>
<td>Autism</td>
<td>7</td>
<td>.21</td>
</tr>
<tr>
<td>Euphoria</td>
<td>17</td>
<td>.67</td>
</tr>
<tr>
<td>Overactivity</td>
<td>25</td>
<td>.64</td>
</tr>
<tr>
<td>Loss of social reserve</td>
<td>16</td>
<td>.45</td>
</tr>
<tr>
<td>Distractibility</td>
<td>11</td>
<td>.41</td>
</tr>
<tr>
<td>Weight loss due to anorexia</td>
<td>17</td>
<td>.44</td>
</tr>
<tr>
<td>Phobias</td>
<td>0</td>
<td>.00</td>
</tr>
<tr>
<td>Obsessions</td>
<td>4</td>
<td>.29</td>
</tr>
<tr>
<td>Conversion symptoms</td>
<td>1</td>
<td>.66</td>
</tr>
</tbody>
</table>

N = number of patients in whom this rating was agreed

K = Cohen's kappa

0 and .00 means that the rating was made by at least one rater, without agreement or that the rating was never made.
auditory hallucinations, thought disorder, bizarre actions, early awakening, marked inactivity, mutism, self-neglect and severe tension and anxiety). Symptoms were rated as 1 (definitely present) or 2 (frequent or severe). The levels of reliability for the presence of an item using Kappa showed a median of .41, mean of .42, and for a severe degree, the median was .39 and the mean, .37.

In each symptom area various measures of severity were made, including the age of onset, the number of episodes, the duration and peak severity. In general, visual analogue scales proved more reliable than 4 and 5 point scales (mean $r = .69$ compared with .55). Thirty-three scales were tried but some proved unreliable, and the final number was reduced to 18, which are listed in Table 3. Their reliability was quite high—median $r .71$, mean .69.

There were particular difficulties in rating the degree of recovery, which is considered important in the descriptive classification of the psychoses. It is hard to get the data needed for these ratings. We experimented with various ratings, including the contrast between episodes and intervals, and maximum and minimum severity during intervals. The reliability was disappointing, with a mean of .45. The least unreliable ratings were the presence of a symptom throughout the study period, and in peak severity during intervals. It was decided, therefore, to use a 3 point scale in 4 areas (auditory hallucinations, delusions, thought disorder and cyclothymia), as shown in Table 4. A rating of zero means that for large periods of time the patient is clear of these symptoms; a rating of 1 means
### TABLE 3

Severity of Psychopathology

<table>
<thead>
<tr>
<th>Variable</th>
<th>Reliability</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Auditory Hallucinations</strong></td>
<td></td>
</tr>
<tr>
<td>Age of onset</td>
<td>.82</td>
</tr>
<tr>
<td>Duration</td>
<td>.69</td>
</tr>
<tr>
<td>Peak frequency</td>
<td>.69</td>
</tr>
<tr>
<td><strong>Morbid Ideas</strong></td>
<td></td>
</tr>
<tr>
<td>Age of onset</td>
<td>.85</td>
</tr>
<tr>
<td>Duration</td>
<td>.75</td>
</tr>
<tr>
<td>Bizarre quality</td>
<td>.71</td>
</tr>
<tr>
<td>Systematization</td>
<td>.80</td>
</tr>
<tr>
<td>Persecution</td>
<td>(not studied)</td>
</tr>
<tr>
<td><strong>Manic Symptoms</strong></td>
<td></td>
</tr>
<tr>
<td>Age of onset</td>
<td>.56</td>
</tr>
<tr>
<td>Duration</td>
<td>.29</td>
</tr>
<tr>
<td>Peak severity</td>
<td>.63</td>
</tr>
<tr>
<td><strong>Depression</strong></td>
<td></td>
</tr>
<tr>
<td>Age of onset</td>
<td>.63</td>
</tr>
<tr>
<td>Duration</td>
<td>.77</td>
</tr>
<tr>
<td>Peak severity</td>
<td>.74</td>
</tr>
<tr>
<td>Biological symptoms</td>
<td>.43</td>
</tr>
<tr>
<td>Suicide attempts</td>
<td>.74</td>
</tr>
<tr>
<td><strong>Number of incidents of violence</strong></td>
<td>.88</td>
</tr>
<tr>
<td><strong>Severity of blunting and apathy</strong></td>
<td>.70</td>
</tr>
</tbody>
</table>
TABLE 4

Ratings of Symptoms Between Episodes

| Variable                  | Chronic Presence |  | Chronic Presence |  | Chronically Severe |  |
|---------------------------|------------------|  |------------------|  |-------------------|  |
|                           | \( N \) | \( K \)  | \( N \) | \( K \)  | \( N \) | \( K \)  |
| Auditory hallucinations   | 3    | .44 | 2    | .18 |  |
| Delusions                 | 7    | .42 | 6    | .42 |  |
| Thought disorder          | 1    | .49 | 1    | .49 |  |
| Cyclothymia               | 6    | .37 | 0    | .00 |  |

\( N \) = number of patients in whom this rating was agreed

\( K \) = Cohen's kappa

0 and .00 means that the rating was made by at least one rater, without agreement or that the rating was never made.
that the symptom is present for most of the time; and a rating of 2 means that it is severe or disturbing for most of the study period. A patient considered to be suffering from a single episode unresponsive to treatment would have a rating of 2 in at least one of these areas, unless his symptoms were those of depression. Depression was omitted because of the impossibility of distinguishing between illness and unhappiness except during major episodes when delusions or biological symptoms were present.

The overlap of symptoms is also of potential value for nosology. We attempted to assess this by noting the duration of overlap of the main symptom groups. The inter-rater reliability was fair (mean $r = .50$), but the ratings seemed unsatisfactory because they attempted more precision than the data allowed; so they were redefined as dichotomous judgments, and in this form the kappa coefficients ranged from $0.21$ to $0.52$ with a mean of $0.38$.

Ratings of the presence of symptoms at any time, rather than episode by episode, jettisons information about the phasic or polymorphous quality of a psychosis. To meet this need, diagnoses were made for each episode under the eight headings: hebephrenia, paranoid hallucinatory psychosis, cycloid psychosis, mania, schizoaffective mania, depression, schizoaffective depression and other diagnoses. The reliability of rating at least one episode in a particular category ranged from $k = 0.27$ to $0.70$ (mean $= 0.42$, median $= 0.45$).

Social skills and initiative are difficult to assess with
interview data. All one can do is to find out what family members and friends are seen (and not seen) and ask general probes about the quality of relationships. The capacity for friendship may be more sensitive to psychosis than the more passive relationships within the family of origin. The distinction between friction and lack of initiative may also be important. In this study, a Netherne scale was again used, with about equal reliability ($r = .69$ compared with $.71$). The capacity for independent living is a third aspect of social adjustment. It is not the same as duration of hospitalization, because hospital stay also depends on symptom levels and admission policies, and because a grossly dependent patient may live at home; occasionally, a completely independent person may be socially incompetent (i.e., a vagrant). This variable proved to be rather unreliable, $r(48) = .43$. Domicile and, in men, unstable work pattern and unemployment were also rated (see Table 5).

Associated Factors, Events, and Interventions

The study of the effect of life events and treatment on psychotic illness requires a careful methodology, and one cannot feel enthusiastic about the inclusion of simple ratings in a schedule. However, it is hard to ignore the outside world entirely in the description of a psychosis. For this reason the schedule includes ratings of handicap, illness, childbirth, hardship, disturbing events and drug-abuse. The reliability of rating some of these as closely related to onset is shown in Table 6. Data on treatment response in individual patients are almost always of poor quality.
### TABLE 5

**Measures of Social Adjustment**

<table>
<thead>
<tr>
<th>Variable</th>
<th>(1) present</th>
<th>k = .43 (19 agreed)</th>
<th>(2) severe</th>
<th>k = .16 (3 agreed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unstable work pattern</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Percentage of time unemployed</td>
<td></td>
<td>r = .59</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Overall employment record</td>
<td></td>
<td>r = .69</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Living with spouse</td>
<td></td>
<td>k = .93 (9 agreed)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Living with family</td>
<td></td>
<td>k = .68 (28 agreed)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Living alone</td>
<td></td>
<td>k = .79 (2 agreed)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other living arrangements</td>
<td></td>
<td>k = .00 (none agreed)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Overall social involvement</td>
<td></td>
<td>r = .69</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Independence</td>
<td></td>
<td>r = .43</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

k = kappa statistic  
r = coefficient of reliability
<table>
<thead>
<tr>
<th>Variables</th>
<th>N</th>
<th>K</th>
</tr>
</thead>
<tbody>
<tr>
<td>Psychotic illness in the family</td>
<td>8</td>
<td>.70</td>
</tr>
<tr>
<td>Intellectual handicap</td>
<td>2</td>
<td>.65</td>
</tr>
<tr>
<td>Physical handicap</td>
<td>9</td>
<td>.00</td>
</tr>
<tr>
<td>Medical illness</td>
<td>9</td>
<td>.00</td>
</tr>
<tr>
<td>Surgery</td>
<td>2</td>
<td>.55</td>
</tr>
<tr>
<td>Childbirth</td>
<td>5</td>
<td>.81</td>
</tr>
<tr>
<td>Side effects of medication</td>
<td>0</td>
<td>.00</td>
</tr>
<tr>
<td>Alcohol abuse</td>
<td>7</td>
<td>.85</td>
</tr>
<tr>
<td>Cannabis abuse</td>
<td>8</td>
<td>.56</td>
</tr>
<tr>
<td>Hallucinogen abuse</td>
<td>3</td>
<td>.49</td>
</tr>
<tr>
<td>Amphetamine or phencyclidine abuse</td>
<td>1</td>
<td>.38</td>
</tr>
<tr>
<td>Friction or discord</td>
<td>17</td>
<td>.52</td>
</tr>
<tr>
<td>Isolation (severe)</td>
<td>1</td>
<td>1.00</td>
</tr>
<tr>
<td>Poverty, hardship</td>
<td>5</td>
<td>.61</td>
</tr>
<tr>
<td>Loss of relationship (severe)</td>
<td>7</td>
<td>.42</td>
</tr>
<tr>
<td>Other threatening events</td>
<td>11</td>
<td>.17</td>
</tr>
</tbody>
</table>

N = number of patients in whom this rating was agreed
K = Cohen's kappa
0 and .00 means that the rating was made by at least one rater, without agreement or that the rating was never made.
Patients are placed on drugs chosen by psychiatrists according to their diagnostic prejudices, usually in combination with other drugs or concurrently with other interventions such as hospital admission. Occasionally a striking response to a single agent given during a stable state, or obvious failure to respond is observed. In spite of the great uncertainty of treatment assessment, a set of ratings is provided for the main treatments--antidepressants, electroconvulsive therapy, neuroleptics, lithium and social or psychological treatment. The reliability of these ratings was not studied during this exercise.

**Overall Indices and Diagnosis**

It is possible to derive the overall indices recommended by Carpenter, Strauss, and Mulch (1973) and Brockington and Kendell et al. (1980) from the ratings. In addition, in the sixth edition the rater makes diagnoses using two authoritative systems, one proposed by the American Psychiatric Association, and the other by the World Health Organization. To encourage innovation, he is asked to make his own diagnosis. In this study the reliability of DSM III and ICD9 diagnoses was not assessed, but a simpler subdivision into 6 categories--chronic paranoid hallucinatory psychosis, hebephrenia, episodic paranoid psychosis, episodic schizoaffective psychoses, manic depressive psychosis and depression--was used. Under favorable conditions of co-training the reliability figures were quite good ($k = 0.61-.89$).
CHAPTER V

DISCUSSION

The purpose of this schedule is two-fold. Firstly, there are clinical benefits in the ability to make lifetime diagnoses. In addition to relatively short-term effects which can be usefully categorized by episode diagnosis, it is obvious that psychotic illness often shows a lifelong disposition or diathesis and there must be biological and psychological traits which account for this. In the search for these factors, the appropriate clinical tools are longitudinal diagnoses and lifetime ratings.

The present schedule offers a systematic approach for describing these tools through the analysis of multi-episode psychotic illness. Ratings can be correlated with other observations, and then diagnoses made according to accepted systems (e.g., DMS III).

The most recent writings of Carpenter, Bartko and Strauss (1981) and Engel (1980) all propose the use of a complex biopsychosocial orientation toward the more complete understanding of psychopathology. Only such a system incorporates the diverse factors which constitute and influence onset, course and treatment response.
This stands in contrast to the orientation of the reductionist scientist, for whom confidence in the ultimate explanatory power of the factor analytic approach in effect inhibits attention to what characterizes the whole. (Engel, 1980, p. 538)

In other words, the preparation of a schedule for making lifetime ratings attempts to understand the patient and his pathology without losing sight of either. For example, Kayton, Beck and Koho (1976) found that a good outcome is dependent on a favorable environment and a good therapeutic relationship as well as a particular diagnosis. Factors become important, not when they stand alone, but as they relate to the life experience of particular person.

The second purpose is concerned with nosological research. There is a need to test hypotheses and to generate new hypotheses. The present position about the classification of the psychoses is unsatisfactory because even the simplest question—whether affective schizophrenic psychoses are truly distinct, or merely segments of a spectrum—has not been resolved. The most recent attempt to answer this (Brockington, Kendell, Wainwright et al., 1980) was hampered by the lack of a lifetime rating schedule. Months were spent arbitrarily condensing hundreds of ratings into the small number required for a discriminant function analysis. Even then there were two sets of ratings (those of the index admission and those of the follow-up period) which competed for a place in the final list. The research was also handicapped by the small number of patients studied (233 in all), and it has not been possible to augment the number by
drawing on other series (e.g., the IPSS) because their rating procedures were different, and almost impossible to convert into a similar form. The present schedule, no doubt with modifications, could provide the basis for a uniform set of lifetime ratings which would allow data to be pooled from a number of different follow-up studies.

The reliability of some of the ratings, especially in the area of psychopathology (Table 2), interval symptoms (Table 4), and the overlap of symptom groups, was not good enough. However, the field study reported here was preliminary. Reliability is a function of three separate influences—the clarity of the clinical concepts measured, the amount of co-training and the nature of the material. The present study was particularly deficient in co-training; the two raters had different backgrounds and there was insufficient time and material for an adequate co-training period. Even with adequate co-training, however, it is unlikely that reliability of lifetime ratings can be brought up to the high levels achieved in the rating of single clinical interviews because the volume of data is greater and more complex, and the rater sometimes has to choose between conflicting observations.

Other studies also reported kappas of low reliability with similar types of data (Helzer et al., 1981; Helzer, Clayton et al., 1977). Kappas in these studies were typically in the .50's. Strauss, Loevsky et al. (1981) encouraged research to continue despite these low figures.
Although the qualitative approach to research used in this phase of study ought not preclude more quantitative methods, it must precede them in order to identify the characteristics that may be of importance and the relationships that might be involved. (p. 123)

Further studies will show what levels of reliability can be achieved.

The present schedule can be compared with the lifetime version of the Schedule for Affective Disorders and Schizophrenia (Spitzer & Endicott, 1979; Andreasen, Grove, Shapiro, Keller, Hirshfield, & McDonald-Scott, 1979). The two schedules differ in numerous ways. The SADS-L is written as an interview while the emphasis of the present approach is the use of records. The advantage of this format is that the patient does not have to be currently available. While the SADS-L recommends the use of all available sources of information such as interviews with the family, case records and staff reports, it does not provide for any systematic use of them as the current format does. The use of these multiple sources of information is necessary as a means for verifying data supplied by the patient.

The SADS-L schedule is concerned with the full range of psychiatric diagnoses, including personality disorder, neurosis and addictions, while this schedule is confined to the study of psychosis. The SADS-L has more symptom ratings but there is much repetition, and 14 of the 35 major psychotic symptoms rated in this schedule are not rated in SADS-L. Both schedules aim to make episode diagnoses, but the groupings are different. Likewise, both schedules make
ratings of the overlap of symptom groups, but in different ways. Both make ratings of the severity of symptomatology; and both use age of onset and the number of episodes.

Research into the psychoses is laborious and has made very slow progress. In addition, there is a time lag as findings are incorporated into clinical practice. In 1978, Silverman and Harrow reported that First Rank Symptoms are not unique to schizophrenia. This was also reported by many other studies but they are still used clinically as though they were pathognomonic signs. Until psychiatrists can classify by etiology (a millennium which is always just around the corner), they must continue to use symptoms, course and outcome, and to search for diagnostic concepts which correspond to objectively demonstrated universal patterns. The present schedule was developed to facilitate the search for such patterns. Then, in addition to a label, a diagnosis will incorporate information about the patient's personal strengths and weaknesses, his therapeutic requirements and a prognosis will be based on the person's capacities for recovery and growth within his particular social and physical environment.

Future studies with this schedule should focus on ways to raise the reliability of scores. More clearly defined operational diagnostic criteria and rules for applying them should help as should using highly trained and experienced raters. As reliability levels are increased, the approach toward agreement will change from the current focus on inter-rater reliability to agreement between
raters and the correct diagnoses (Grove, Andreasen, & McDonald-Scott, 1981). Then we will be dealing with issues of validity which will have tremendous clinical relevance. Clearly there is much work yet to be done.
SUMMARY

Kraepelin wrote, "It has become clear in all areas that causes, clinical course and outcome better define specific mental disorders than loose collections of symptoms" (Kraepelin, 1919). While many would agree with this statement, the emphasis on clinical research in recent years has been on the study of the acute episode, via the structured psychiatric interview. The problems of rating psychopathology and course of illness over a span of time which includes several episodes, have not been given the same attention and consequently have not been satisfactorily resolved.

The present study described a field study with a new schedule: the Schedule for Rating Lifetime Psychopathology and Course of Illness. Among the particular problems which were addressed were the difficulty of obtaining adequate data, allowing for the effects of treatment, developing a feasible rating discipline, and condensing large numbers of variables into measures of sufficient sensitivity. While the present schedule is similar to the SADS-L in purpose, it has the advantage of evaluating the severity of a psychosis and systematically reviews all the information about a person's illness. On the basis of this work, recommendations can be made on the measures which can be used in future studies. The schedule will
be suitable for combined clinical and biological studies searching
for the factors which determine a lifelong disposition to psychotic
illness and for nosological research.
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Wing, J. Discriminating symptoms in schizophrenia. *Archives of General Psychiatry*, 1975, 32, 853-859.

# Schedule for Longitudinal Diagnosis

<table>
<thead>
<tr>
<th>Field</th>
<th>Description</th>
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<tbody>
<tr>
<td>NAME</td>
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<td>DATE OF BIRTH</td>
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<td>ONSET</td>
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<tr>
<td>DATE OF LAST CONTACT</td>
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<td>RATER DATE</td>
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</tbody>
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5th Edition,  
Brockington & Kaufman,  
November 1980
Principles

1. This schedule has 2 main purposes:
(a) to provide ratings of the presence and severity of psychopathology over a period of time which may contain several episodes of illness; and (b) to diagnose the diathesis which underlies a chronic or recurrent mental illness.

2. Its main concern is with symptomatology and course, in accordance with the view that the classification of the psychoses should be based on clinical phenomena, at least until an effective aetiological classification has been discovered.

The schedule also deals with aetiological factors, and with social functioning (so far as possible dissociated from the clinical ratings). Very little attention is given to treatment response because (a) this cannot satisfactorily be determined in individual patients subjected to multiple simultaneous interventions, and (b) it seems important to keep treatment response and clinical diagnosis separate. Similarly scant mention is made of family history of mental illness because (a) reliable information on the family history usually requires interviewing the family members, and (b) it seems important to make the diagnosis on the basis of the patient's own symptomatology rather than his relative's.

3. It is divided into 4 parts:

A The cumulative summary dealing consecutively with the patient's life history from early childhood, his personality, his psychiatric history in its setting of events and circumstances, and his status at the end of the study period. The purpose of the summary is to condense a large volume of information from many sources into a concentrated but graphic descriptive account which can be reviewed at a single session. The summary should retain the original descriptions of salient symptoms and incidents using the patient's or observers' own words.

B A descriptive analysis of each episode in turn.

C Measurements and ratings of the course of illness, aetiological factors, the presence and severity of psychopathology, social functioning and response to treatment.

D Diagnoses based (a) on formal rules, and (b) on the rater's own judgment.

4. Throughout the schedule the zero rating means either that the item was not present, or there was insufficient information, so that it is only necessary to make positive ratings.

5. A glossary of ratings is written on the left hand page of the schedule, and it is planned to have a separate dictionary of precedents.
Guidelines for episode diagnoses

Schizophrenia
The presence of schizophrenic or paranoid symptoms without a depressive, manic or cycloid syndrome.
Schizophrenic symptoms = auditory hallucinations, passivity experiences, catatonic phenomena, thought disorder, blunting, apathy and peculiar behaviour. Paranoid symptoms = delusions.

Cycloid psychosis
The presence of schizophrenic and affective symptoms without a depressive, manic or paranoid syndrome. There is either (a) marked confusion, perplexity, or (b) a pleomorphic and labile clinical picture.

Depression
The presence of depressed mood and either marked hopelessness and suicidal thinking, or many neurotic symptoms (neurotic depression), or biological symptoms (endogenous depression).

Delusional depression
Mood congruent delusions are present, together with depression.

Schizoaffective depression
Schizophrenic or paranoid symptoms are present, together with depression.

Mania
The presence of elevated mood, overactivity, grandiosity, loss of social restraint and loss of goal (any two of these).

Delusional mania
Mood congruent delusions are present, together with mania.

Schizoaffective mania
Schizophrenia or paranoid symptoms are present, together with mania.

Neurosis
Neurotic symptoms, such as obsessions or phobias, are present without depression or schizophrenia.

Addiction
The clinical picture is dominated by abuse of alcohol or drugs.

Non-specific psychosis
Behaviour suggests the patient is psychotic but without sufficient information to enable the condition to be subclassified.

Other diagnosis
Any which do not fit into the categories listed above.
SUMMARY OF INFORMATION AVAILABLE

LIST OF EPISODE DIAGNOSES

<table>
<thead>
<tr>
<th>Episode number</th>
<th>Date of onset</th>
<th>Diagnosis</th>
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<td>15</td>
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</tbody>
</table>
Onset and duration of mental illness

Total length of study period
This is the interval between the onset of the first episode and the date of last contact, measured in days.

Age of onset of first episode
The patient's age at the onset of the first episode leading to consultation or admission.

Rapidity of onset
This is the interval of time, measured in days, between the onset of symptoms and the full development of the psychosis. Take an average of all the episodes in which there is sufficient information to estimate this interval.

Rapidity of recovery
This is the interval between the first sign of improvement and the point at which there is no further improvement, measured in days. Take an average of all episodes with sufficient data to estimate this interval.

Number of episodes
An episode is considered to have finished if the patient has improved, and has been out of hospital functioning at his or her normal level for 2 weeks, or if, while remaining in hospital, he has apparently been well for 4 weeks.

Number of admissions
This includes admissions to a day hospital. If a patient is transferred from in-patient to day-patient units, or from one hospital to another, this does not count as a fresh admission.

Total duration of episodes
The episode duration is the interval in days between onset of symptoms and recovery.

Time spent in mental hospital
This includes admission to a day hospital, and is measured in days.
**DESCRIPTION OF EPISODE**

<table>
<thead>
<tr>
<th>Number</th>
<th>Name</th>
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</table>

**Dates**

<table>
<thead>
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<th>Duration in days</th>
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</table>

**ONSET**

<table>
<thead>
<tr>
<th>RAPIDITY OF ONSET</th>
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</table>

**ADMISSION**

<table>
<thead>
<tr>
<th>RAPIDITY OF RECOVERY</th>
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**PEAK**

<table>
<thead>
<tr>
<th>EPISODE</th>
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**END OF PLATEAU**

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<tr>
<th>HOSPITAL STAY</th>
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**RECOVERY**

**DISCHARGE**

**Context**

(Describe the patient's personality, and the circumstances and events related to onset)

**Clinical features**

(Describe the main symptoms, estimating the duration and severity of symptom groups, and commenting on any temporal dissocation between them)

**Degree of recovery and nature of residual symptoms**
<table>
<thead>
<tr>
<th>Category</th>
<th>Data</th>
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<td>Rapidity of Onset</td>
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<td>Rapidity of Recovery</td>
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<td>Number of Admissions</td>
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<tr>
<td>Total Duration of Episodes</td>
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<tr>
<td>Total Time Spent in Mental Hospital</td>
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</tbody>
</table>
Auditory hallucinations and passivity phenomena

Presence of phenomena
In general, 1=definite presence at some time, 2=prominent or frequent.

Nonverbal auditory hallucinations
This class should be extended to include whispering where words cannot be distinguished, and patient's name being called.

Verbal hallucinations
Distinguish between remarks congruent with manic or depressive mood, hostile or commanding voices in 2nd person, and third person hallucinations.

Thought insertion and withdrawal
Thoughts appear in the patient's mind which he does not identify as his own; include thought echo and commentary. Thoughts are withdrawn by some external agency.

Thought diffusion or broadcasting
The patient experiences his thoughts ringing out loud, being broadcast or otherwise diffused so that others receive them without the use of normal media of communication.

Made feelings, impulses or actions
The patient experiences direct interference with his feelings or volition.

Age of onset
The age at which any of these phenomena first appeared.

Number of episodes
The number of episodes in which any of them have been present.

Peak frequency
0=absent; 1=occasional (e.g., once/month); 2=often (e.g., once/day); 3=frequent (e.g., once/hour); 4=continuous. Use the full rating if the symptom is severe and disturbing.

Contrast
This is the difference between the peak severity during episodes and intervals.

Degree of recovery
This is the difference between severity at best and worst periods.

Time present (measured in days)
This is the total time the patient has had any of these symptoms at frequency level 2.
Auditory hallucinations and passivity phenomena (cont'd)

Measures of dissociation
Estimate the time in days when these phenomena have been present without delusions, and without affective disorder.
AUDITORY HALLUCINATIONS AND PASSIVITY PHENOMENA

Presence of phenomena

NON-VERBAL AUDITORY HALLUCINATIONS
VERBAL HALLUCINATIONS CONGRUENT WITH MOOD
HOSTILE OR COMMANDING VOICES
VOICES COMMENTING OR DISCUSSING
THOUGHT INSERTION OR WITHDRAWAL
THOUGHT DIFFUSION OR BROADCASTING
MADE FEELINGS, ACTIONS OR IMPULSES

Severity of phenomena

AGE OF ONSET
NUMBER OF EPISODES
PEAK FREQUENCY DURING EPISODES
DURING INTERVALS
MINIMUM FREQUENCY
TIME PRESENT: TOTAL
WITHOUT DELUSIONS
WITHOUT DEPRESSION OR MANIA
Paranoid symptoms

Ratings of ideas
1 = A morbid idea is expressed, perhaps in a way suggesting it is delusional, but it is not persistent or preoccupying; 2 = preoccupying, over-weighted ideas; 3 = preoccupying delusions.

Classification by content*
'Guilt' includes self-deprecation. 'Hypochondriasis' implies ideas of illness and excludes bizarre ideas of bodily change. 'Nihilism' includes Cotard's delusion, delusions of catastrophe and of poverty. 'Grandeur' includes extravagant religious ideas. 'Reference or misinterpretation' excludes Capgras delusions. 'Persecution' implies damage to person or social standing, and includes deserved retribution. 'Delusional explanation' is based on experiences such as passivity, hallucinations or depersonalization. 'Control' implies direct interference with the patient's mind. 'Sexual delusions' include De Clerambault's syndrome, sexual metamorphosis and pregnancy. 'Jealousy' implies delusions of infidelity. 'Others' include zoophilic metamorphosis, Capgras' phenomenon and fantastic delusions.

Non-auditory hallucinations
There are included here because they are usually associated with delusions. 'Taste and smell' includes the olfactory reference syndrome. 'Tactile and somatic' include any such sensations attributed to outside influences. 'Visual hallucinations' excludes imagery and hypnagogic effects.
1 = has definitely occurred at some time; 2 = prominent or disturbing.

Severity ratings
Age of onset, number of episodes, contrast, degree of recovery and measures of dissociation are counted or rated in the same way as auditory hallucinations and passivity phenomena.

Idiosyncracy
This is a rating of peak severity, concerned with the extent to which the patient's ideas depart from the beliefs of his subculture. 0 = no abnormal ideas; 10 = subculturally shared beliefs, including folie a deux; 20 = unshared ideas held with partial conviction; 30 = unshared, unshakable convictions with content not far removed from conceivable reality (e.g., persecution); 40 = content impossible; 50 = flamboyant creation of numerous fantastic delusions.

Systematization
This is another rating of peak severity. 0 = no delusions; 10 = ideas, however bizarre, are only expressed on isolated occasions; 20 = a single or encapsulated persistent delusion; 30 = a system of delusional ideas; 40 = an extensive system explaining most of what is happening to the patient; 50 = a system explaining everything which has happened since the universe began.
Paranoid Symptoms (cont'd)

Severity during episodes, intervals and at minimum
0=absent; 1=equivocal evidence of the presence of delusions; 2=their definite presence; 3=delusions have a severe effect on the patient’s life; 4=extreme.

Time present
This means at severity level 2.

*'Personality traits' of self-punitiveness, suspiciousness, possessiveness and other aspects of 'paranoid personality' are also rated here.
PARANOID SYMPTOMS

Presence of morbid ideas
GUILT
HYPOCHONDRIASIS
NIHILISM
GRANDEUR
REFERENCE OR MISINTERPRETATION
PERSECUTION
EXPLANATION IN TERMS OF OCCULT OR PHYSICAL FORCES
CONTROL
SEXUAL
JEALOUSY
OTHERS

Presence of non-auditory hallucinations
TASTE OR SMELL
TACTILE OR SOMATIC
VISUAL

Severity

AGE OF ONSET

NUMBER OF EPISODES

IDIOSYNCRACY

SYSTEMATIZATION
PARANOID SYMPTOMS (cont'd)

Severity

PEAK SEVERITY DURING EPISODES

DURING INTERVALS

MINIMUM SEVERITY

TIME PRESENT: TOTAL

WITHOUT AUDITORY HALLUCINATIONS OR PASSIVITY

WITHOUT DEPRESSION OR MANIA

CONTRAST

DEGREE OF RECOVERY
Other phenomena found in mental illness

'Cycloid' phenomena
The features of a cycloid psychosis are (a) perplexity or confusion, (b) a pleomorphic clinical picture with transitory delusions and psychotic experiences and affective disturbances, especially fear and elation but without a persistent paranoid or affective syndrome. 'Confusion' means that the patient appears bemused, or dreamy, and is unable to think clearly; it does not imply the presence of an acute organic syndrome. 1=present, 2=prominent. Severity ratings apply to episodes showing these phenomena.

Thought disorder
The phenomena are classified into the idiosyncratic use of words (neologisms) or phrases, incomprehensibility because of unclear connections, and poverty of content (very little communicated in spite of the fact that the patient speaks freely). Rate severity as follows: 1=equivocal evidence of thought disorder; 2=the definite presence of one of these 3 forms; 3=well developed thought disorder; 4=severe, with incomprehensible speech much of the time. Time present refers to thought disorder at least of grade 2 in severity, excluding manic or cycloid episodes.

Catatonia
Posturing, catalepsy, automatic obedience, motor blocking but not stupor. 1=present, 2=prominent.

Blunting, inappropriate affect
The patient shows little emotion, or the emotion shown is incongruous. Do not include emotional flattening in the context of gross retardation, nor incongruous laughter in the presence of mania. 1=present, 2=prominent.

Apathy or loss of volition
The patient shows a persistent lack of initiative and motivation, not in the context of depression or oversedation. 1=present, 2=severe.

Severity of defect
Rate the severity of blunting and/or apathy on the visual analogue scale. 10=equivocal evidence; 20=at least one definitely present; 30=a prominent part of the illness; 40=severe when compared with other blunted, apathetic patients; 50=complete loss of emotion & initiative.

Violence
Count number of attacks on persons or property (not just abuse or threats). Severity: 1=abusive, threatening; 2=attacks on property, minor attacks on persons; 3=grievous attacks on persons; 4=attempts to kill.
Other phenomena found in mental illness (cont'd)

Criminal behaviour, irresponsibility
1=irresponsible behaviour, including heedless promiscuity; 2=involvement in crime.

Manipulative behaviour
The patient uses undue or unfair pressure to attain his ends.
1=present; 2=prominent.

Autism
The patient shows a pathological lack of interest in people.
1=schizoid traits; 2=severely withdrawn.
OTHER PHENOMENA FOUND IN MENTAL ILLNESS

Cycloid phenomena

CONFUSION, PERPLEXITY

AGE OF ONSET

NUMBER OF EPISODES

TIME PRESENT

Thought disorder

NEOLOGISMS, IDIOSYNCRATIC USE OF LANGUAGE

INCOHERENCE

POVERTY OF CONTENT

PEAK SEVERITY DURING EPISODES

DURING INTERVALS

MINIMUM SEVERITY

TIME PRESENT

Motility, affect, volition

CATATONIA

BLUNTING, INAPPROPRIATE AFFECT

APATHY, LOSS OF VOLITION

SEVERITY OF BLUNTING AND APATHY

| 0 | 10 | 20 | 30 | 40 | 50 |

Violence and other abnormal social behaviour

NUMBER OF INSTANCES OF VIOLENCE

PEAK SEVERITY DURING EPISODES

DURING INTERVALS

MINIMUM SEVERITY
Violence and other abnormal social behaviour (cont'd)

CRIMINAL BEHAVIOUR, IRRESPONSIBILITY

MANIPULATIVE BEHAVIOUR

AUTISM
Manic symptoms

Presence of symptom groups
Grandiose ideas will have been rated under paranoid symptoms.

Euphoria
1=definite presence of elevated mood, 2=ecstasy or excitement.

Overactivity
This may be shown in activity or speech.
1=definite overactivity or pressure, 2=severe overactivity with a marked reduction in sleep.

Loss of restraint
This refers to a loss of shyness and social inhibition.
1=obvious increase in sociability, 2=reckless or embarrassing behaviour.

Loss of goal
Behaviour or speech shows rapid switching from one task or theme to another.
1=distractibility, rambling speech, 2=flight or ideas.

Severity ratings
1=hypomania, or minor euphoric mood swings, 2=the definite presence of a manic syndrome for more than a day, 3=severe mania with at least one of the phenomena including grandiosity rated 2, 4=extreme and exhausting mania.
Time present refers to a manic syndrome of at least 2 on severity rating.

Cyclothymia
Rate here an apparent variation in energy level; 1=probable, 2=marked. This will also be discerned in the difference between peak and minimum during the intervals.
MANIC SYMPTOMS

Presence of symptom groups

EUPHORIA
OVERACTIVITY
LOSS OF RESTRAINT
LOSS OF GOAL

Severity of mania

AGE OF ONSET
NUMBER OF EPISODES
PEAK SEVERITY DURING EPISODES
DURING INTERVALS
MINIMUM SEVERITY
TIME PRESENT: TOTAL
WITHOUT DELUSIONS
WITHOUT AUDITORY HALLUCINATIONS OR PASSIVITY

Cyclothymia

VARIABILITY IN ENERGY LEVEL
Depression

Presence of phenomena
Morbid ideas of guilt, hypochondriasis and nihilism have already been rated under paranoid symptoms.

Anorexia, weight loss
1=definitely present, 2=severe with marked weight loss.

Insomnia
1=initial insomnia at least 2 hours, 2=early waking, at least 2 hours for at least a week.

Anergia, retardation
1=patient feels lifeless, and activity is an effort, 2=obvious retardation or lack of activity.

Slowed inefficient thinking
This includes loss of concentration and memory. 1=present, 2=prominent.

Agitation
Uncontrollable physical restlessness not due to mania or akathisia. 1=present for brief periods, 2=severe.

Peak severity of depressive affect
This scale is concerned with dysphoric affect, not biological symptoms or delusions. 0=None at any time; 10=unhappiness at worst; 20=definite depression at some time; 30=severe enough to require treatment; 40=suicide seriously considered; 50=successful planned suicide.

Number of suicide attempts
This includes premeditated, impulsive and manipulative attempts, to a maximum of 9.

Peak severity of biological symptoms
0=None; 10=minor, e.g., some anorexia and initial insomnia; 20=syndrome definitely present; 30=prominent biological symptoms; 40=severe weight loss, definite retardation or prolonged agitation; 50=prolonged stupor.

Overall severity of depression during episodes and intervals
0=None; 1=unhappiness; 2=depression with suicidal ideas or biological symptoms; 3=severe depression with suicidal plans, retardation or delusions; 4=extreme.

Time present
This refers to the presence of depression of at least grade 2 on severity ratings.
DEPRESSION

Presence of phenomena

ANOREXIA, WEIGHT LOSS

INSOMNIA

ANERGIA, RETARDATION

SLOWED, INEFFICIENT THINKING

AGITATION

Severity

AGE OF ONSET

NUMBER OF EPISODES

NUMBER OF SUICIDE ATTEMPTS

PEAK SEVERITY OF DEPRESSIVE AFFECT

PEAK SEVERITY OF BIOLOGICAL SYMPTOMS

PEAK SEVERITY DURING EPISODES DURING INTERVALS

MINIMUM SEVERITY

TIME PRESENT: TOTAL

WITHOUT DELUSIONS

WITHOUT AUDITORY HALLUCINATIONS OR PASSIVITY
Neurotic symptoms

Agoraphobia and social phobia
l=present, 2=prominent. Severe shyness = social phobia (1)

Obsessional phenomena
l=present, 2=one of the main problems.

Anxiety & tension
These are ubiquitous, so l=severe, a cause of complaint in themselves; 2=extreme, with panic attacks, or pain due to muscular tension.

Depersonalization
l=present at some time, 2=prolonged.

Self-mutilation
The most common form would be delicate self-cutting. l=this has occurred; 2=self-cutting is a major symptom, or more severe mutilation (e.g., self-castration)

Conversion symptoms
These include fugues as well as hysterical paralysis, etc.
1=present at some time, 2=a major symptom.

Severity of neurotic symptoms
This applies to any of the above neurotic symptoms.
l=present; 2=disabling, or requiring treatment; 3=severe; 4=extreme.
Ratings of age on onset, number of episodes and time present apply to those rated at least 2 on this scale.

Abuse of alcohol or drugs
l=abuse of drugs, or of alcohol to the point of problem drinking; 2=addiction.
4=related to psychotic episode.
NEUROTIC SYMPTOMS, ADDICTION & ABUSE OF ALCOHOL OR DRUGS

Presence of neurotic symptoms

AGORAPHOBIA
SOCIAL PHOBIA
OBSessional IDEAS AND RUMINATIONS
RITUALS
ANXIETY, TENSION
DEPERSONALIZATION
SELF-MUTILATION
CONVERSION SYMPTOMS

Severity of neurotic phenomena

AGE OF ONSET
NUMBER OF EPISODES
PEAK SEVERITY DURING EPISODES
DURING INTERVALS
MINIMUM SEVERITY
TIME PRESENT: TOTAL
WITHOUT DEPRESSION

Abuse of alcohol or drugs

ALCOHOL
BARBITURATES OR BENZODIAZEPINES
AMPHETAMINES OR PHENCYCLIDINE
CANNABIS
HALLUCINOGENIC DRUGS
OPIATES
Social status

Unstable pattern of work
Jobs are often lost without good reason. 1=probable; 2=definite; 9=not applicable.

Percentage of time unemployed
The denominator is the time spent out of hospital. 90=100%; 99=not applicable.

Overall work rating
This visual analogue scale takes an overall view of effectiveness in performing wage-earning or housekeeping roles in men and women, taking into account all indications of impairment.
0=evidence of vitality, ambition or enterprise
10=full employment (e.g., housewife with young children)
20=slight impairment (e.g., 5% unemployed, housewife without children or job)
30=definite impairment (e.g., 50% unemployed, unstable record, neglected home)
40=severe impairment (e.g., unemployed)
50=complete inactivity.

Ratings at different times
'At the beginning' means before the first episode; 'at the end' means at the end of the study period; 'decline' is the difference between these two. 'At best' is at the best time during the study period (usually during an interval); 'At worst' is at the worst time (presumably during an episode); 'contrast' is the difference between these two.
The ratings are 0-4, corresponding to cue points 0,10,20,30 & 40 on the corresponding visual analogue scales.

Overall rating of social involvement
This scale is concerned with social initiative and the ability to make satisfactory relationships. Passive association with family counts less than efforts to make relationships outside the family.
0=a person heavily involved with family, friends and sociable hobbies
10=considerable family contacts plus friends or social hobbies
20=some evidence of isolation (e.g., family contacts but no friends)
30=definite isolation (no close relationships but some attempts at socialization)
40=misanthropy and self-isolation
50=a complete recluse

Domicile
Where the patient was living most of the study period.
1=living with spouse; 2=living with family; 3=living with friends;
4=in a hostel; 5=alone; 6=vagrant; 7=in hospital all the time.
Social status (cont'd)

Overall rating of dependence
This rating is concerned with the patient's dependence on help from family, servants or professional staff in organizing his life and coping with his basic needs.
0=no help required
10=minimal assistance
20=minimum level at which pathological dependence definitely recognized
30=cannot function outside an institution
40=patient's dependence creates a management problem
50=totally unable to care for himself
SOCIAL STATUS

Work

UNSTABLE PATTERN

PERCENTAGE OF TIME UNEMPLOYED

WORK RATING: OVERALL RATING

AT THE BEGINNING

AT THE END

AT BEST

AT WORST

Social involvement

DOMICILE

SOCIAL INVOLVEMENT: OVERALL RATING

AT THE BEGINNING

AT THE END

AT BEST

AT WORST

Dependence

DEPENDENCE: OVERALL RATING

AT THE BEGINNING

AT THE END

AT BEST

AT WORST
Aetiological factors

Psychotic illness in the family
One of the patient's first degree relatives has been admitted to mental hospital with a psychotic illness, or has committed suicide. No attempt is made to subclassify the type of psychosis.

Intellectual handicap
The patient's intelligence quotient is about 85 or below (one standard deviation below the mean).

Physical handicap
This includes blindness, deafness, disease of the nervous system or other chronic physical illness causing handicap.

Adverse circumstances *
These should be present during most of the study period.

Friction, discord
This includes marital friction, and other severe social friction including actual persecution.

Isolation
This includes recent immigrants without much social support, or with a considerable language barrier.

Medical illness
This includes endocrine disease, infections such as infectious mono-nucleosis.

Surgery and childbirth
These are self-explanatory. The temporal connection between the event and the onset of the psychosis should be close, e.g., 2 weeks for the puerperium.

Side effects of drugs
The patient must actually be taking the drug at the time the psychosis began.

Loss of important relationship
This may be through death or separation.

Other threatening events
These include loss of work, shameful happenings.

Poverty and hardship
This would include having to bring up children without support.
Aetiological factors (cont'd)

*In general, events are rated according to their apparent psychological impact and may therefore be rated under more than one heading. 1=present; 2=severe and probably contributing to the illness.
AETIOLOGICAL FACTORS

Biological factors present throughout study period

PSYCHOTIC ILLNESS IN THE FAMILY
INTELLECTUAL HANDICAP
PHYSICAL HANDICAP

Adverse circumstances present throughout study period
FRICITION, DISCORD
ISOLATION
POVERTY, HARDSHIP

Medical factors related to episodes
MEDICAL ILLNESS
SURGERY
CHILDBIRTH
SIDE EFFECTS OF DRUGS

Psychological precipitants
LOSS OF IMPORTANT RELATIONSHIP
OTHER THREATENING EVENTS
Response to treatment
There are 4 ratings:
1=the patient has had this treatment, but it is not known what effect it had.
2=there is an apparent response to this treatment, i.e., the patient improved shortly after this treatment only was begun.
3=the patient seems to depend on this treatment in order to remain well, i.e., he relapses shortly after it is withdrawn.
4=the patient failed to respond, i.e., he remained ill in spite of adequate amounts of the treatment being delivered.

Social intervention
This includes hospitalization and social casework.

General psychotherapy
This includes ventilation and insight therapy.

Specific psychological treatment
This includes relaxation treatment, response prevention and other focused techniques based on learning theory.

Drugs
Antidepressant agents include the monoamineoxidase inhibitors, tricyclics and tetracyclics. Neuroleptics include the phenothiazines, thioxanthenes and butyrophenones.
RESPONSE TO TREATMENT

SOCIAL INTERVENTION

GENERAL PSYCHOTHERAPY

SPECIFIC PSYCHOLOGICAL TREATMENT

Drugs

BENZODIAZEPINES

ANTIDEPRESSANT AGENTS

NEUROLEPTICS

LITHIUM

ELECTROCONVULSIVE THERAPY
Guidelines for longitudinal diagnosis

The distinction between chronic and episodic illness
This is one of the basic distinctions in this schema, though it is recognized that the boundary between episodes and intervals is often blurred. If the illness is chronic, the alternatives are chronic schizophrenia, chronic depression, organic mental illness, neurosis or personality disorder. If it is episodic, it may be affective or non-affective.

1. Chronic schizophrenia

A chronic illness with persistent psychotic symptoms including delusions of any kind
- hallucinations
- thought disorder
- peculiar behaviour
- loss of affect and volition

excluding neurotic symptoms
- ideas of reference
- hypochondriasis
- depression.

Compatible are (a) a pattern of exacerbations and partial response to treatment; (b) periods of depression; (c) periods of excitement association with grandiosity which antedates it.

Subtypes:
- **Chronic paranoid psychosis** (with systematized delusions)
- **Chronic auditory hallucinosis** or passivity

A mixture of these two

Hebephrenia (thought disorder, shallow or incongruous affect, loss of volition, poverty of speech, autism, peculiar behaviour, ill-systematized delusions).

2. Episodic non-affective illness

There is a pattern of one or more episodes with full recovery, but the symptomatology includes characteristic symptoms of schizophrenia.

Subtypes:
- **Episodic paranoid psychosis** (episodic delusional psychosis appropriate to its setting, e.g., in the presence of social isolation. The presence of depression is compatible.

**Cycloid psychosis** (described earlier in schedule).
Guidelines for longitudinal diagnosis (cont'd)

Recurrent schizoaffective psychosis (each episode containing a fully developed manic or depressive syndrome and mood-incongruent psychotic features)

Pleomorphic psychosis (a complete mixture of episode diagnoses)

Other forms of episodic schizophrenia (including periodic catatonia).

3. Manic depressive psychosis

At some stage in his life the patient has had an attack of mania (described earlier in the schedule). The presence of schizoaffective episodes is compatible provided that there is at least one typical episode of mania, or of depression with biological features or mood-congruent delusions.

Subtypes: Unipolar manic illness

Bipolar illness with mania

Bipolar illness with minor manic swings

4. Depression

The patient has had no manic, cycloid or schizophrenic episodes. The presence of schizoaffective episodes is compatible provided there is at least one typical depressive illness. If there is a mixture of depression and paranoid elements, the diagnosis depends on whether the depression or the paranoid element is considered to be primary.

Subtypes: Depression reactive to circumstances or events

Single episodes of endogenous depression

Recurrent endogenous depression

Chronic hypochondriasis
Guidelines for longitudinal diagnosis (cont'd)

5. Other diagnoses

**Organic mental illness** (e.g., postleucotomy syndrome)

**Alcoholism, drug addiction**

**Neuroses, personality disorder**

**Factitious psychosis**

**Undiagnosed** (insufficient information, borderline/mixed states)
SYNOPSIS

DIAGNOSIS

(a) Using guidelines

(b) Rater's choice (state reasons)
SCHEDULE FOR LONGITUDINAL DIAGNOSIS

NAME

NUMBER

RATER

DATE

6th edition,
Brockington & Kaufman,
May 1981
Principles

1. This schedule has 2 main purposes:
   (a) to provide ratings of the presence and severity of psychopathology over a period of time which may span several episodes of illness;
   (b) to make a longitudinal ('lifetime') diagnosis.

2. Its main concern is with symptomatology and course, in accordance with the view that the classification of the psychoses should be based on clinical phenomena, at least until an effective aetiological classification has been discovered.

The schedule also deals with aetiological factors and social functioning (as far as possible dissociated from clinical ratings). Very little attention is given to treatment response because (i) this cannot satisfactorily be determined in individual patients subjected to multiple simultaneous interventions, and (ii) it seems important to keep treatment response and clinical diagnosis separate. For similar reasons, scant mention is made of the family history of mental illness because (i) reliable information on this usually requires interviewing family members, and (ii) it seems important to make a diagnosis from the patient's own symptoms rather than his relatives.

No distinction is made between 'personality' and 'illness' because this distinction seems a superficial one. Instead an effort is made to contrast the severity of some phenomena during episodes and the intervals between them.

3. A separate document should accompany each schedule, either an interview with the patient, or a 'cumulative summary' of the case records (or both). The cumulative summary and the interview should deal consecutively with the patient's life history from early childhood, his personality, his employment record, his key relationships, his psychiatric history in its setting of events and circumstances, and his status at the end of the study period. Important dates should be included. The purpose of the summary is to condense a large volume of information from many sources into a concentrated but graphic descriptive account. It should retain the original descriptions of salient symptoms and incidents using the actual words recorded, just as the interview should record the patient's statements verbatim.

4. The schedule is divided into 3 parts:
   A. A descriptive analysis of each episode in turn (for which separate sheets are provided);
   B. Ratings of the course of illness, the presence and severity of psychopathology, social functioning, associated factors and response to treatment;
   C. Diagnoses based (i) on formal rules, and (ii) on the rater's own judgment.
5. Throughout the schedule a zero rating means that the item was not present. If there is insufficient information, leave the item blank. In most analyses this will be regarded as the same as 'not present.'

6. A glossary of ratings is written on the left hand page of the schedule.
SYNOPSIS

(Use this sheet to make an overall summary of the course of the illness)
Description of episodes
Fill out a separate sheet for each episode.

The definition of an 'episode'
An episode is a period of mental illness or psychiatric disturbance more or less sharply differentiated from periods of health. It scarcely ever corresponds exactly to an admission to hospital. A patient may not consult a psychiatrist during an episode. One of the main difficulties in determining the number and duration of episodes is to find a threshold for distinguishing them from the minor affective and neurotic symptoms common in everyday life. One guideline is admission to hospital, though rarely it may not be justified. As an arbitrary principle, we recommend that the disturbance should last at least 2 weeks and should consist of more than a simple affective change—e.g., there should be biological or psychotic features as well, or an impairment of functioning or a suicide attempt. It is also difficult to fix the end of an episode. Discharge from hospital is a guide, indicating a significant waning of an illness even if there are residual symptoms, but it usually occurs some days or weeks after improvement, and a single admission may contain more than one episode (e.g., both manic and depressive phases of a bipolar illness). 'Recovery' is noted when a patient who has improved significantly makes no further improvement. If he relapses in less than 2 weeks this is regarded as the continuation of the same episode, unless the symptoms are quite different. If he relapses in more than 2 weeks, it is a new episode even if the symptoms are the same. If there is no significant change in the level of symptoms, the illness is continuous and the episode length equal to the study period. If there is no information on the duration of an episode, it is considered to be equal to the duration of admission. The rater must do his best to determine the beginning and end of episodes from the available data. This judgment has proved to be fairly reliable ($r=0.66$ for the total duration of episodes, measured in days).

Age on onset and total length of the study period
The study period begins with the onset of the first episode. The onset is recognized by the first psychiatric symptom or by obvious social deterioration preceding overt symptoms. The end of the study period is the date of the last contact with the patient.

Dates of admission and discharge
Admission includes admission to a day hospital or a medical ward with psychiatric symptoms. Transfer from one facility to another (e.g., to another mental hospital, to a medical or surgical ward or to a day hospital) does not count as a fresh admission, but formal discharge (even for one day) is the end of an admission. The total duration of admissions to hospital is measured in days.
Descriptions of episodes (cont'd)

**Rapidity of onset**
This is the interval between the onset of symptoms and the full development of the illness, which is often indistinguishable from the date of admission. There are 3 grades: 1=acute onset, i.e., less than 10 days; 2=intermediate; 3=insidious onset, i.e., 6 months or more.

**Episode diagnoses**
The definitions are the same as those used for the longitudinal diagnoses and are given at the end of the schedule.

**Overall pattern of the illness**
This scale takes an overall view of the degree of recovery from episodes. 0=Full recovery, symptom-free; 1=Recovery with minor residual symptoms, e.g., phobias, ideas of reference; 2=Partial recovery from psychotic symptoms, e.g., with residual encapsulated delusions; 3=No recovery; 4=Deterioration.
DESCRIPTION OF EPISODE

NAME

DATE OF ONSET
DATE OF ADMISSION
RAPIDITY OF ONSET
DATE OF RECOVERY
DATE OF DISCHARGE
DURATION OF ADMISSION
DURATION OF EPISODE

Context
(Describe the patient's personality and the circumstances related to the onset)

Clinical features
(list the main manifestations)

Degree of recovery
(List the residual symptoms)

EPISODE DIAGNOSIS
RATINGS OF ONSET AND COURSE

DATE OF BIRTH

DATE ON ONSET

DATE OF LAST CONTACT

AGE OF ONSET

STUDY PERIOD

NUMBER OF ADMISSIONS

TIME SPENT IN MENTAL HOSPITAL

NUMBER OF EPISODES

NUMBER WITH RAPID ONSET

NUMBER WITH INSIDIOUS ONSET

TOTAL DURATION OF EPISODES

EPISODE DIAGNOSES

PARANOID/HALLUCINATORY PSYCHOSIS

HEBEPHRENIA

CYCLOID PSYCHOSIS

MANIA

SCHIZOAFFECTIVE MANIA

DEPRESSION

SCHIZOAFFECTIVE DEPRESSION

OTHERS

(Specify)

OVERALL PATTERN OF THE ILLNESS
Psychopathology ratings
Symptoms are rated if they appear at any time during the study period (intervals or episodes). In general, 1=definitely present; 2=frequent or severe. If the symptom group is not present, leave age of onset and duration blank.

Self-depreciation and guilt
Rate here overweighted preoccupation with peccadilloes, unreasonable feelings of responsibilities, e.g., for the death of a brother in a road accident after a quarrel, outlandish claims, e.g., to have killed President Kennedy, negative identification, e.g., "Hitler's daughter", or a general sense of wickedness, e.g., having committed the sin against the Holy Ghost.

Megalomania
This includes grandiose identification, e.g., "Queen Elizabeth," or religious identification which would not be accepted by the subculture, e.g., "Mary Magdalene," relationship to a famous person, special accomplishments, e.g., "author of the Bible" or special powers, e.g., "cure for cancer and schizophrenia," but not erotomania, which should be rated under 'others.'

Reference and misinterpretation
Rate here any idea that events, e.g., TV programmes, people coughing refer to the patient, or that others are talking about him, plotting against him or setting up situations to test him.

Persecution
This implies that the patient or a loved one (e.g., a child) is going to be killed or damaged in some serious way, or be deprived of freedom. This common symptom is also rated on a scale.

Bizarre quality of delusions
This visual analogue scale measures the peak severity of one parameter of delusion formation, the degree of idiosyncracy of the patient's ideas compared with his milieu.
0=no abnormal ideas
10=subculturally shared ideas, e.g., folie a deux
20=unshared ideas held with partial conviction
30=delusions not far from conceivable reality (e.g., persecution)
40=content impossible under any circumstances
50=flamboyant creation of numerous fantastic delusions.
Psychopathology ratings (cont'd)

Systematization of delusions
This scale measures the degree of development of delusional systems.
0 = no delusions
10 = the ideas however bizarre are only expressed on isolated occasions
20 = a single persistent delusion
30 = a system of delusional ideas
40 = an extensive system explaining all that happens to the patient
50 = a system explaining all that has happened since the world began.

Severity of persecution
This scale measures the peak severity of persecutory ideas.
0 = no ideas of persecution
10 = suspicious traits, but no delusional ideas
20 = ideas of persecution not involving an intention to kill the patient
30 = the delusion that others intend to kill the patient or loved ones
40 = a pervasive persecutory system severely affecting the patient's life
50 = permanent persecution by the whole world.

Age of onset and duration
These refer to the onset and duration of fully developed delusions.
PSYCHOPATHOLOGY

Morbid ideas

SELF-DEPRECIATION & GUILT

MEGALOMANIA

REFERENCE & MISINTERPRETATION

PERSECUTION

OTHERS
   (Specify content and severity)

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Auditory hallucinations with depressive content
Rate here voices with a self-accusing, hopeless or suicidal content, whether in the 2nd or 3rd person, and whether they are true or 'pseudo-' hallucinations, e.g., "She's sick, she's crazy," "You are worthless, kill yourself," "Go tell your teach you are a fool."

Auditory hallucinations in the 3rd person
Rate voices (true or 'pseudo') which talk about the patient, commenting on his thoughts, actions or character, discussing or arguing about him. The content may be depressive.

Other auditory hallucinations heard through the ears
Rate here all other true auditory hallucinations, including voices addressing remarks and orders to the patient, e.g., "President Carter is going to take the children away," "Cut your hair off," Voices heard in manic mood are rated here.

Passivity phenomena and other 'nuclear' symptoms
Rate here all mental phenomena experienced by the patient as the work of others acting on his mind, including inserted thoughts, e.g., "People's thoughts will ring in my head"; auditory psydohallucinations; thought commentary; 'made' impulses and movements, e.g., "My chest and arms move as though someone is pushing me"; 'made' emotions; the removal of thoughts, e.g., "People take thoughts from my head and use them in conversation." Also rate here voiced thoughts (gedankenlautwerden); thought echo; and thought diffusion (broadcasting), e.g., "Thoughts flow through holes in my head."

Explanatory ideas associated with auditory hallucinations
Rate here any morbid ideas arising through the patient's attempt to explain his true auditory hallucinations.

Ideas of influence and possession
1 = ideas of influence, i.e., the notion that someone or something is acting on the patient's brain, not through the normal channels of communication (including auditory hallucinations) but by magic or modern technology (e.g., laser beams), e.g., "Spirits force her to think of suicide."
2 = ideas of possession, i.e., external forces operate directly on the patient's mind, e.g., "Black cats inside my head are trying to take me over." Be sure that 'control' is not being exerted through conventional channels.

Peak frequency of auditory hallucinations or passivity experiences
0 = Never experienced
10 = On isolated occasions only
20 = Seldom, e.g., once/week
30 = Every day (on the average)
40 = Once/hour (on the average)
50 = Continuously
Auditory hallucinations (cont'd)

Presence of these symptoms during intervals between episodes
1 = definitely present
2 = frequent or disturbing

Time when these symptoms are present
If these phenomena occur very briefly at the peak of an episode, it is safe to estimate '10 days' which will usually be less than 1% of the study period.
Auditory hallucinations (A.H.) and passivity phenomena

A.H. WITH DEPRESSIVE CONTENT

A.H. IN THIRD PERSON

OTHER A.H. HEARD THROUGH THE EARS

PASSIVITY EXPERIENCES & OTHER 'NUCLEAR' SYMPTOMS

EXPLANATORY IDEAS ASSOCIATED WITH A.H.

IDEAS OF INFLUENCE AND POSSESSION

PEAK FREQUENCY

AGE OF ONSET

PRESENCE DURING INTERVALS

DURATION
Other hallucinations
Olfactory hallucinations include the olfactory reference syndrome. Tactile and somatic include those attributed to outside influences. Visual exclude imagery, hyponogogic effects and minor unformed hallucinations, e.g., "black spots and borders."

Thought disorder
The patient's utterances are incomprehensible due to idiosyncratic use of words (neologisms) and phrases, or the intermingling of unrelated ideas. Do not rate incomprehensibility due to dysphasia, low IQ, unfamiliarity with the language or high emotional tension. Irrelevant replies are not enough. Rate separately thought disorder occurring during florid episodes only, and chronic thought disorder.

Confusion, perplexity
1 = The patient appears puzzled, bemused, bewildered, dreamy, in a trance, e.g., "he hardly knew what was going on." 2 = Formal disorientation.

Depersonalization
This includes derealization ("People looked like flat pictures"), loss of feelings ("Empty and unable to feel") and subjective bodily change ("Body shrinking, bones getting larger, turning into a woman").

Violence
Count the number of attacks on persons and property, not just abuse or minor threats.

Self-mutilation
The patient attempts to harm himself without attempting suicide, e.g., burns himself, digs holes in his arm with a can opener, tries to cut off his hand.

Catatonia
This includes posturing, catalepsy, automatic obedience and motor blocking but not stupor.

Bizarre actions
The patient acts in an extraordinary way, suggesting the presence of delusions, e.g., cutting up the carpet and throwing away all green and blue objects. Do not rate catatonia, violence, suicide attempts, self-mutilation or manic extravagance here.

Blunting of affect
1 = a marked degree of inappropriate affect (but not giggling during manic mood); 2 = complete & inappropriate lack of emotion, not due to retardation or sullenness.
Other Psychotic Symptoms (cont'd)

Apathy & loss of volition
The patient sits around doing nothing and shows no initiative. Include 'institutionalization' but do not make this rating in the presence of severe depression.

Autism
The patient withdraws from all social contact and relationships, though he may retain emotionality (e.g., anxiety, religious excitement) and volition (e.g., obstinately refusing to participate)
E.g., A former graduate nurse withdrew after the death of her parents and would only relate to them, believing she was 'God's special child'; a man of 21 stayed at home for a year often staring into the mirror and chanting and rarely speaking even to his family.

Severity of 'negative' symptoms
Rate here the severity of blunting, apathy or autism as chronic symptoms.
0 = Normal volition, emotionality and capacity for relationships
10 = Equivocal evidence (e.g., schizoid traits, inappropriate affect, lack of drive)
20 = The definite presence of one of these symptoms
30 = 'Negative' symptoms are a prominent part of the illness
40 = They are severe when compared with other blunted, apathetic or autistic patients
50 = Complete withdrawal and inactivity
Some other psychotic symptoms

HALLUCINATIONS OF TASTE & SMELL

TACTILE OR SOMATIC HALLUCINATIONS

VISUAL HALLUCINATIONS

EPISODIC THOUGHT DISORDER

THOUGHT DISORDER PERSISTENT DURING INTERVALS

CONFUSION, PERPLEXITY

DEPERSONALIZATION

NUMBER OF INSTANCES OF VIOLENCE

SELF-MUTILATION

CATATONIA

BIZARRE ACTIONS

BLUNTING OF AFFECT

APATHY & LOSS OF VOLITION

AUTISM

SEVERITY OF 'NEGATIVE' SYMPTOMS 0 50
Manic symptoms
Euphoria includes statements like "I have never felt happier" and actions like laughing, singing and dancing. Overactivity includes pressured speech, increased work output and, in severe form, sleeping little without fatigue. Loss of social reserve intrusive social or sexual behaviour, disrobing and other signs of loss of normal social inhibitions. Loss of goal is rapid switching from one theme to another, usually shown by rambling speech or flight of ideas, but also by distractibility.

Severity of mania
0 = No manic symptoms
10 = Hypomania or minor manic mood swings
20 = The definite presence of a manic syndrome
30 = Mania with marked loss of control, or high energy encroaching on sleep
40 = Highly disorganized manic behaviour
50 = Life threatening, exhausting mania

Cyclothymia
This is a tendency to oscillate in energy and mood when recovering from major episodes or during the intervals between them.

Symptoms of severe depression
Anorexia should only be rated when it is obvious to others ("He didn't eat for a week", "He was refusing even liquids") or results in the loss of at least 15 lbs weight. Early waking should be a source of complaint, or at least 2 hours earlier than normal. Marked inactivity is more than subjective loss of energy--an obvious lack of vitality in a depressed person, e.g., "She could hardly move for days.

Mutism should be obvious to others or last at least a day. Self-neglect is a conspicuous lack of self-care, or neglect of dependents (e.g., children).

Some neurotic symptoms
Severe tension & anxiety. These ubiquitous symptoms should only be rated when extreme, e.g., with panic, pain due to tension, obvious fear and agitation (uncontrollable restlessness in the context of anxiety). Phobias include agoraphobia, social phobia, school phobia and others severely affecting a patient's life, not spider phobias, etc. Obsessions include time-consuming rituals and distressing intrusive thoughts or impulses. Conversion symptoms include the classical symptoms of hysteria, e.g., blindness, paralysis, fugues.

Number of suicide attempts
Include manipulative and demonstrative attempts as well as serious attempts to die.
Manic Symptoms (cont'd)

Peak severity of depressive affect
0 = None
10 = Unhappiness
20 = Definite depression at some time
30 = Severe enough to require treatment
40 = Suicide seriously considered
50 = Successful planned suicide

Peak severity of biological symptoms
The biological symptoms include anorexia, insomnia and inefficient thinking.
0 = None
10 = Minor, e.g., symptoms of anorexia and insomnia only
20 = At least one definite biological symptom
30 = Several biological symptoms
40 = Severe weight loss, incapacitating impairment of energy or mentation
50 = Prolonged stupor

Onset and severity of affective symptoms
This refers to the presence of mania or depression rating at least 20 on the scales.
### Manic Symptoms

- Euphoria
- Overactivity
- Loss of social reserve
- Loss of goal
- Peak severity of mania
- Age of onset
- Cyclothymia between episodes
- Duration of mania

### Depression and anxiety

- Anorexia & weight loss
- Early morning waking
- Marked inactivity, retardation
- Mutism
- Self-neglect
- Severe tension & anxiety, agitation
- Phobias
- Obsessions
- Conversion symptoms

### Number of suicide attempts

### Peak severity of depressive affect

### Severe of biological symptoms

### Age of onset

### Duration of depression
Overlap of symptom groups
There are 10 possible conditions, and patients will usually have several, viz., delusions as the only symptom (paranoid states), AH alone, mania alone, depression alone, AH and delusions (paranoid hallucinatory psychosis), delusional mania, AH and mania, delusional depression, AH and depression, mixed affective states. Auditory hallucinations here include passivity and other nuclear symptoms. If a patient has a complex or shifting mixture of all 4 groups (as in cycloid) all the combinations should be rated.

Ratings of social functioning

Unstable pattern of employment
Several jobs have been lost for inadequate reasons. 1 = probable, 2 = definite, 9 = not applicable.

Percentage of time unemployed
The denominator is the time spent out of hospital. 98 = 100%, 99 = not applicable (e.g., mother).

Overall work rating
This scale takes an overall view of effectiveness in wage-earning or housekeeping roles in men and women, taking into account all indications of impairment.
0 = Evidence of vitality, ambition or enterprize
10 = Full employment (e.g., a housewife effectively caring for young children)
20 = Slight impairment (e.g., 5% unemployed, housewife without job or children
30 = Definite impairment (e.g., 50% unemployed, unstable pattern, neglected home)
40 = Severe impairment (e.g., 95% unemployed in spite of opportunity)
50 = Complete inactivity

Domicile
The patient's residence during most of the study period.
1 = Living with spouse; 2 = Living with family; 3 = Living with friends; 4 = Living in a hostel; 5 = Living alone; 6 = Vagrant; 7 = In hospital all the time.

Social involvement
This scale is concerned with social initiative and making satisfactory relationships. Passive contact with family of origin counts less than efforts to make friends outside.
0 = A person heavily involved with family, friends and sociable activities
10 = Considerable family contacts plus friends and/or sociable activities
20 = Some evidence of isolation (e.g., family contacts but no friends)
30 = Definite isolation (no close relationships but some attempts at socialization)
Overlap of Symptom Groups (cont'd)

Social involvement (cont'd)
40 = Misanthropy and self-isolation
50 = A complete recluse

Independence
This scale is concerned with the patient's dependence on help from family, servants or professional staff in organizing his life and coping with his basic needs.
0 = No help required
10 = A minimal degree of dependence often found in normal people
20 = Minimum level at which pathological dependence can be recognized
30 = Patient has great difficulty in managing outside an institution
40 = Within an institution, patient's dependence creates a management problem
50 = Totally unable to care for himself

Decline in social adjustment
With reference to his earlier life, the patient shows an obvious decline in work, social relationships or independence.
1 = definite, 2 = severe.
Overlap of symptom groups

DELUSIONS
A.H. OR PASSIVITY
MANIA
DEPRESSION

RATINGS OF SOCIAL FUNCTIONING

*UNSTABLE PATTERN OF EMPLOYMENT
PERCENTAGE OF TIME UNEMPLOYED
OVERALL WORK RATING
DOMICILE
SOCIAL INVOLVEMENT
INDEPENDENCE
DECLINE IN SOCIAL ADJUSTMENT
Abuse of alcohol and drugs
1 = abuse, e.g., frequent drunkenness, 2 = dependence or addiction, 4 = use of the drug was related in time to the onset of the psychosis.

Side effects of medication
The patient must actually be taking the drug at the time the psychosis began.

Psychotic illness in first degree relatives
A parent, sibling or child of the patient has been admitted to a mental hospital or has committed suicide. No attempt is made to diagnose these illnesses.

Intellectual handicap
The patient's IQ is 85 or below (one standard deviation below the mean).

Physical handicap
This includes blindness, deafness, disease of the nervous system or other chronic physical illness causing handicap.

Medical illness
The medical illness (e.g., endocrine disease, infectious mononucleosis) must be closely related in time to the onset of the mental illness.

Surgery
The temporal relationship between surgery and onset of the psychosis must be close, e.g., within 4 weeks.

Childbirth
1 = childbirth within 3 months of the onset; 2 = childbirth within 2 weeks of the onset.

Psychological factors
Events are rated according to their apparent psychological impact and it is possible for an event to be rated under more than one heading. 1 = present; 2 = probably contributing to the causation of the illness.

Friction and discord
Disharmony is common in many families. Only severe friction is rated here, e.g., "an bittered family atmosphere," a violent marriage, chronic friction with a domineering mother, actual persecution.

Isolation
There is a lack of close human contact, e.g., a lonely boy living with his father after his mother died; recent immigration.
POSSIBLE AETIOLOGICAL FACTORS (Cont'd)

Poverty & hardship
The patient is living at a very low material level, in poor housing and lacking some necessities of life; e.g., an unsupported mother with 3 children.

Loss of important relationship
This is the loss, by death or separation, of an important relationship, e.g., death of a parent who was close to the patient, breakup of a marriage in distressing circumstances.

Other threatening events
These include rape, severe accidents, failure at school, shameful events, loss of employment, infidelity of a spouse, unwanted pregnancy.
POSSIBLE AETIOLOGICAL FACTORS PRESENT

**Drugs**

- ALCOHOL
- CANNABIS
- HALLUCINOGENIC DRUGS
- AMPHETAMINES
- Others (specify)

**SIDE EFFECTS OF MEDICATION**

**Biological factors**

- PSYCHOTIC ILLNESS IN THE 1<sup>o</sup> RELATIVES
- INTELLECTUAL HANDICAP
- PHYSICAL HANDICAP
- MEDICAL ILLNESS
- SURGERY
- CHILDBIRTH

**Psychological factors**

- FRICTION AND DISCORD
- ISOLATION
- POVERTY AND HARDSHIP
- LOSS OF IMPORTANT RELATIONSHIP
- OTHER THREATENING EVENTS
Response to treatment

0 = This treatment has not been used
1 = It has been used, but its effect was unknown
2 = The patient apparently responded to it
3 = If taken off this treatment, the patient relapsed
7 = The treatment had no effect

Antidepressant agents include the monoamine oxidase inhibitors, the tricyclics and the tetracyclics. Neuroleptics include the phenothiazines and the butyrophenones. Social and psychological measures include admission to hospital, social casework, behavioural treatment for obsessions and phobias, token economy and general psychotherapy.

DIAGNOSIS

The definitions of terms apply to episode and longitudinal diagnoses.

Longitudinal diagnoses
Make the minimum number of diagnoses necessary to summarize the case (usually one).

1(a) Chronic paranoid hallucinatory (PH) psychosis. The patient has delusions, passivity, hallucinations and/or thought disorder but no marked depression or mania. He never fully recovers, but there may be a pattern of exacerbations and partial response. Inter-current depression, or excited phases in the context of longlasting megalomania may occur.

1(b) Hebephrenia. The patient exhibits peculiar behaviour and affect, autism, loss of volition and poverty of speech but no prominent delusions, hallucinations or depression.

2(a) Episodic paranoid hallucinatory psychosis. As above but the illness is acute with full recovery.

2(b) Episodic schizoaffective psychosis. There are episodes of schizoaffective psychosis (i.e., mania or depression plus passivity phenomena, auditory hallucinations or bizarre delusions, abbreviated SM, SD) or cycloid psychosis (florid psychoses with either confusion/perplexity or a pleomorphic clinical picture, elements of several syndromes being present with none predominating, abbreviated C). Use this category if the patient has one episode of SM, SD or C, or several episodes all belonging to this group, or a combination of C and D, or a combination of PH with SM, SD, C or M. Do not use it for a combination of SD and D (which would be classified as depression) or of SM or C with M (which would be classified as manic depressive).

3 Manic depressive psychosis. This illness is defined by the occurrence of a typical manic episode (M) in which the patient shows euphoria, grandiosity, overactivity, loss of restraint and/or loss of goal. It includes unipolar mania, bipolar illness and depression with manic swings.
Longitudinal diagnoses (cont'd)

4 Depression. The episode (D) is defined by the presence of depression often accompanied by biological symptoms, suicidal acts and congruent delusions. This category includes depression reactive to events and circumstances and endogenous or recurrent depression.

5 Neuroses and personality disorders. These include obsessional neurosis, phobias and anxiety neuroses, hysteria, anorexia nervosa, antisocial personality and factitious psychosis.

6 Other diagnoses. These include addictions, organic disease of the brain and undiagnosed mental illness.
RESPONSE TO TREATMENT

ANTIDEPRESSANT AGENTS

NEUROLEPTICS

LITHIUM

ELECTROCONVULSIVE THERAPY

SOCIAL OR PSYCHOLOGICAL MEASURES

(Summarize treatment)

DIAGNOSIS

(a) Using guidelines

(b) Rater's choice
    (Give reasons)
The thesis submitted by Carol F. Kaufman has been read and approved by the following committee:

Dr. Alan S. DeWolfe, Director
Professor, Psychology, Loyola

Dr. LeRoy A. Wauck
Professor, Psychology, Loyola

The final copies have been examined by the director of the thesis and the signature which appears below verifies the fact that any necessary changes have been incorporated and that the thesis is now given final approval by the Committee with reference to content and form.

The thesis is therefore accepted in partial fulfillment of the requirements for the degree of Master of Arts.

4/26/82  
Date

Director's Signature
APPROVAL SHEET

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[Signature]
Date: 4/28/52

Director's Signature