

SOME FACTORS PREDISPOSING
TO INSTITUTIONALISM IN
CHRONIC PSYCHIATRIC PATIENTS

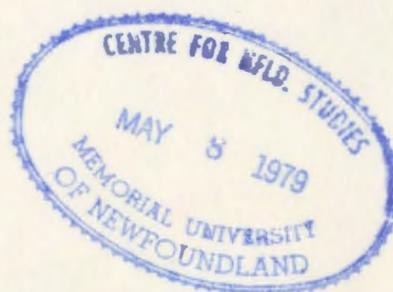
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SOME FACTORS PREDISPOSING TO INSTITUTIONALISM IN CHRONIC
PSYCHIATRIC PATIENTS

by

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This work would not be possible without
the selection of a...
Psychology, National...
supervisor and a... It is a great
bid for all that

TO HELEN

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ABSTRACT

Institutionalism ("institutional neurosis"), the mental and social impoverishment of long-stay psychiatric patients, has been observed by previous researchers to be the result of poverty of the social environment in the mental hospital, the result of lack of contact with the outside world, and the result of idleness.

The present research includes a survey of all psychiatric patients staying in hospital supervised boarding homes and of a random sample of patients in the wards of the only mental hospital in Newfoundland. The main objective was to determine if certain pre-morbid factors predispose to institutionalism.

The researcher examined the patients, interviewed those in charge of the patients, and reviewed the hospital records for "hard data". Institutionalism was measured through the rating scale "social withdrawal", a scale constructed, validated and used by previous researchers of institutionalism.

Two hundred seventy four patients in boarding homes and fifty random long-stay hospital patients were surveyed. 29.6% of the boarded patients and 80% of the hospital ward patients were found to suffer from institutionalism. Low intelligence, poor education and disabilities in hearing, speech, locomotion and manual dexterity, were significantly associated with institutionalism. Extremes of age on first admission, celibacy, low occupational status in the patient or his father, and visual disability did not prove to be associated with institutionalism.

Those patients who were found to suffer from institutionalism, despite the fact that they were not cut off from the outside world

(i.e. those visited and visiting their homes), tended to be threatening in manner, deluded or affected in their hearing.

The findings of this research appear to support the following:

- a. Institutionalism is not confined to hospital wards but may appear in boarding homes. The findings of other researchers that social skills of a psychiatric patient do not improve by stay in a boarding home are confirmed.
- b. Some patients are more susceptible to institutionalism than others.
- c. Institutionalism tends to be associated with those biological or social handicaps which affect communication and activity of the patient.

CHAPTER 1. INTRODUCTION

Definition of the Association

The Association is a non-profit organization
dedicated to the improvement of the
economic and social conditions of the
people of the region. It is a
voluntary organization, formed by
citizens of the region, who have
united their efforts to achieve
the common good of the community.

SECTION A: PREAMBLE

Article 1. Purpose of the Association
Article 2. Membership

CHAPTER I: INTRODUCTION

Definition of Institutionalism

Institutionalism, as defined in this study, is the impoverishment (of feelings, thoughts, initiative and social activity) which appears in psychiatric patients, following a prolonged stay in an institution. This impoverishment is manifest mainly in social withdrawal. The patient, becomes slow in his movements, shows periods of underactivity during the day, avoids talking or mixing with others and appears not to care about his personal appearance. Such a patient, usually, shows not only a disinclination to do anything that requires involvement with other persons but also disinterest even in activities that could be carried out in the shelter of solitude e.g. hobbies or "passive" activities such as watching television. In severe cases of institutionalism the table manners of the patient are affected and incontinence may appear.

The above syndrome has been described by many authors, to be enumerated later, and it is known under several names. Some of these names are simple synonyms, e.g. "institutional neurosis" (Barton, 1966), others describe similar but not identical syndromes. These syndromes will be discussed later.

Structure of Chapter I

Chapter I is divided in two sections. Section A, titled "Preamble", contains an examination of some early observations, of historical interest, on the effect of institutions, followed by a comparison of several varieties of institutions. Section B, titled "Institutionalism and Premorbid Factors" is the introduction proper to the topic of the thesis.

SECTION A: PREAMBLE1. The history of the concept of institutionalism

Sextum nobis certamen est, quod Graeci
acediam uocant, quam nos taedium siue
anxietatem cordis possumus nuncupare.

John Cassian
(Cassien, 1965)

a. "Acedia", the first description of institutionalism

An impoverishment of feelings, decrease of activity, neglect of personal care and purposelessly going in and out of one's room, as a result of living in an institution (i.e. a syndrome similar to what we name "institutionalism") was first described by John Cassian, (spelled Cassien in French) in the 4th century A.D. (Mora, 1967; Cassien, 1959, 1965). The victims were young monks in monasteries.

Cassian used the term "acedia" (From the greek $\bar{\kappa}\epsilon\delta\omicron\mu\alpha\iota$, meaning both "I am concerned" and I take care") and defined it as the "disgust or anxiety of the heart" (Cassien, 1965, p. 385). He described acedia as being a state similar to sorrow, affecting mainly those monks who were living in isolation, coming on especially around 5 or 6 o'clock in the afternoon. Acedia produced a horror for the environment, disregard for the brother monks and "lack of courage for work". An enormous appetite, a feeling of being tired, a bored going in and out of one's cell without any reason and a desire for sleep were also features of acedia. Cassian recommended manual work as the best treatment and advised monks to earn their living even if they had no need for it.

Ellenberger summarises the "syndrome" of acedia as a "gradual impoverishment of mental energy" (1970, p. 398). The "syndrome" was

common. It was treated successfully when St. Benedict introduced systematic work in the monasteries (Ellenberger, 1960). Acedia appears to be the first syndrome, analogous to institutionalism, ever to be described.

b. - A note on the early history of psychiatric institutions

The history of psychiatric institutions starts probably in the century (4th A.D.) when Cassian described acedia. Basileias which "included a hospital and is believed to be the first organised charitable system in the Christian Greek East" (Constantelos, 1968, p. 154) was established around 372 A.D. In the subsequent centuries charitable institutions for the residential care of mental patients appeared in many places.

The atmosphere, however, of residential institutions and the methods of care of psychiatric patients, differed, for historical reasons, from one period to another (see Table I.1). For example, during the 17th century, the psychiatric patients were all incarcerated in institutions together with the poor, the criminals and the social deviants (Zuchthaus in Hamburg, Hôpital General in Paris, Workhouses in Britain). According to one interpretation (Ackerknecht, 1968; Rosen, 1968) this incarceration was seen as a solution to the impending social crisis that threatened the absolutist governments. In Britain, perhaps, humanitarian reasons were originally behind the establishment of Workhouses. Whatever the motives, inhumane handling of psychiatric patients may have been encouraged in institutions where the "bad" were indiscriminately housed, and probably confused with the "sad" and the "mad". In the 19th century, in contrast, a humanistic approach prevailed (see Table I.1), exemplified by the investigation of "mad-

TABLE I.1

houses' at Bristol A SELECTION OF DATES IN
THE
HISTORY OF PSYCHIATRIC INSTITUTIONS

1. FIRST PSYCHIATRIC INSTITUTIONS

- 4th Century A.D. First known "house for lunatics" in Byzantium
 560 Monks took care of mentally ill in Cologne
 705 Asylum for the "insane" in Baghdad
 1377 The "Bethlehem" Hospital (Bedlam) in London is used for mental patients
 1409 Mental Hospital in Valencia (Father Jofré)
 1566 First Mental Hospital in Mexico (Alvarez)

2. INSTITUTIONS IN EUROPE ADMIT NOT ONLY PSYCHIATRIC PATIENTS BUT ALSO "SOCIAL DEVIANTS"

- 1620 Zuchthaus in Hamburg
 1656 Hôpital General in Paris (Louis XIII)
 1657 "Renfermement des pauvres"
 1773 Williamsburg Asylum, Virginia. First exclusively mental hospital in the U.S.A.
 1784 "Narrenturm" in Vienna

3. A HUMANISTIC APPROACH TOWARDS PSYCHIATRIC PATIENTS

- 1793 Pinel strikes off the chains of mental patients
 1801 "Traité medicophilosophique sur l'alienation mentale" by Pinel
 1814 The House of Commons (Britain) investigates barbarous conditions in "madhouses"
 1837 R.G. Hill abolishes restraints at the Lincoln Asylum (Britain)
 1838 French Legal Code for psychiatric patients by Esquirol
 1839 J. Conolly abolishes restraints at Hanwell (Britain)
 1855 New York State legislature for mental hospitals
 1864 Broadmoor Institution for Criminally Insane (Britain)
 1909 National Committee for Mental Hygiene in New York

4. REGRESSION INTO BARBARISM

- 1939 Mental patients are led to Gas Chambers in Nazi Germany

(The above table was compiled on the basis of information and dates available in a number of publications (Ackerknecht, 1968; Mora, 1967; Galdston, 1967; Szasz, 1970)

houses" in Britain (1814) the French Legal Code for patients (1838) and the New York hospital legislature (1855).

Although the atmosphere of residential institutions is largely determined by historical reasons, the attitude of eminent psychiatrists, who influenced generations of physicians and other health care staff, provides a good illustration of the ideology of their period. Such eminent psychiatrists were Pinel, Griesinger, Kraepelin and Bleuler.

c. Pinel

The year 1793, when Phillippe Pinel struck off the chains of psychiatric patients at Bicêtre, in Paris, is considered a landmark in the history of psychiatry. Pinel believed that there were "proofs of the happier effects of a mild, conciliating treatment, rendered effective by steady and dispassionate firmness" (Pinel, 1962, p. 4). In the same book he considered as very successful the "governor" (i.e. administrator) of Bicêtre whose "servants were generally chosen from among the convalescents, who were allured to this kind of employment by the prospect of a little gain" (Ibid, p. 91). Piersin, the governor of Bicêtre, in his letter to the Commission of Civil Administration (19 du frimaire, an III) wrote: "Since the revolution ... (the patients) ... stay as long as they are ill and are sent to their families or friends as soon as one is sure of their full recovery..." (Foucault, 1972, p. 488). In 1788 Tenon in his "Mémoires sur les Hôpitaux" had already described the complications resulting from hospitalisation itself as a "fever of prisons or hospitals" (Foucault, 1972a, p. 16). At about the same period the Comité de Mendicité de l'Assemblée Nationale" put into question the whole necessity for hospitals suggesting "communal homes for patients

which would act as substitutes for the family" for the patients who did not have a family (Foucault 1972a, p. 39).

Pinel was criticized by Foucault as introducing the role of the physician, at least in the eyes of the patient, as that of a miracle-maker ("thaumaturge") and a paternalistic authority (Foucault, 1972b, p. 526). Foucault claims that Pinel's scientific objectivity was a reification ("chosification") of the patient based on the presumed "magic power" of the psychiatrists.

d. Griesinger

Griesinger who is considered an "organicist", ended his 1845 textbook with favorable comments on the Gheel Colony, which was one of the first boarding care systems for psychiatric patients. He was also a great believer in the need for separation of "curable" from "incurable" patients (Griesinger, 1965, p. 508) and males from females (p. 513) and of the need for stringent discipline.

e. Kraepelin

Kraepelin, the psychiatrist who has influenced modern theories in psychiatry more than any other person, described in 1917, in his review of a century of psychiatric care, the "bestial" and "degenerate" behaviour of patients. He understood it as "institutional artifacts" a concept akin to institutionalism and considered it the result of "isolation" of patients. He said that "such shameful conditions usually developed only after a long confinement" (Kraepelin, 1962, p. 141). Kraepelin also emphasized preserving and "putting to the best possible use" the patients' damaged faculties through occupation. He recommended family nursing and described a system of boarding care which started in Germany, in Rockwinckel early in the 19th century,

similar to that of Gheel in Belgium.

The humanitarian attitude of Kraepelin is manifested clearly in his review of a century of psychiatry. One must, therefore, agree with Alexander and Selesnick (1967, p. 164) that "the younger generation of psychiatrists ... (who consider Kraepelin) ... a rigid and sterile codifier of disease categories ... (which) contribute to neither understanding the causes of diseases nor their prognosis" are grossly unfair to Kraepelin.

f. Bleuler

Eugen Bleuler occupies a special position in the history of institutionalism. There are three reasons: (a) He expanded the nosological entity of dementia praecox into the broader syndrome of the "group of schizophrenias" (Bleuler, 1950), (b) He actually spent a large part of his life living in a psychiatric institution, (c) He actually described institutionalism.

Bleuler expanded Kraepelin's concept. In some cases Kraepelin diagnosed manic-depressive psychosis while Bleuler in the same cases schizophrenia. Binswanger (1958) reports this diagnostic disagreement in the case of Ellen West: "Kraepelin is consulted and diagnoses melancholia" (p. 257), and later "for Bleuler the presence of schizophrenia is indubitable" (p. 266). Bleuler pointed out that in schizophrenia, as he conceived it, incurability and deterioration at the end were not necessary characteristics. Bleuler's book on schizophrenias has been called "a successful welding of Kraepelin's new discipline of systematic classification of symptoms, Freud's sensitive attention to the dynamic importance of the content of symptoms, and Bleuler's own evaluative idea of a hierarchy of symptoms"

(Lehmann, 1967, p. 596). As schizophrenia is the most common diagnosis in long stay patients of most mental hospitals Bleuler's concept (used much more frequently by psychiatrists than that of Kraepelin, at least in N. America) is a landmark in the history of institutionalism.

Bleuler (1950, p. 474) observed that the institution "carries with it the danger that the patient may become too estranged from normal life". Neglect, he suggested, leads to chronic deterioration in schizophrenia. He advocated early discharge of some apparently severely ill patients, sudden transfers to other wards, assignment of responsibility to the patient, work therapy and a human community of patients. In his textbook (Bleuler, 1924, p. 219) he suggested "family care" for schizophrenics "that have run their course" and for oligophrenics.

g. Treatment in institutions and the approach of the great psychiatrists

All four of the psychiatrists mentioned advise against lengthy hospitalisation and favor alternative patterns of treatment. They all stress a humanitarian attitude. It is however Pinel, the "shy", "unassuming", "medical journalist and translator with a small medical practice" (Ellenberger, 1974, p. 20) who is assigned an important position during the French Revolution, and Bleuler the grandson of discriminated and deprived farmers who appear most inclined to develop a "dialogue" with their patients. It appears that for Pinel and Bleuler patients are persons to be trusted with responsibility.

In the history of reform of psychiatric institutions many other psychiatrists have laid down the principles of the abolition of res-

traint, or "moral treatment": Chiarugi in Tuscany (1788), Tuke in York (1796), Langermann in Bayreuth (1805), Conolly at Hanwell (1839). Also Hallaran (1810) recognised the value of work for improving the mental state of patients, Reid (1816) described asylums as "manufactories of madness" and Alridge (1859) deplored the "monster asylums" (Hunter and Macalpine, 1963). The specific interest of Pinel, Griesinger, Kraepelin and Bleuler is their impact not only on patients' management but also on psychiatric thinking in general.

From the 18th century (the time of Pinel, Chiarugi, and Tuke) to the present time many changes have occurred in institutions. At present even old fashioned mental hospitals differ from the institutions which used to house the criminals, the orphans, the aged or the political opponents, at least in most countries. It is, therefore, necessary to distinguish several varieties of institutions.

Besides the mental hospitals, there were also other methods for the care of psychiatric patients which did not isolate the patient from society. The first model was developed in the 17th century or earlier.

h. The care of psychiatric patients outside of hospitals

Morrissey (1967) describes in detail how the first boarding care program for psychiatric patients originated, in Gheel, Belgium. Around 600 A.D. Dymphna the christian daughter of a pagan Irish King was obliged to marry her own father after her mother died. She fled to Antwerp but her father traced her and killed her in Gheel. A church was erected to commemorate St. Dymphna and, since Dymphna symbolized the triumph of chastity over the "insane" desires of her father, the place became famous for helping mental patients. Although

we do not know exactly when boarding care started in Gheel there are written records of patients placed in families at least as far back as 1693.

2. Institutionalism and varieties of institutions

In 1957 Goffman presented a paper on the undesirable effects of institutions on their inmates in the "Symposium on Preventive and Social Psychiatry" in Washington which he later expanded into a chapter of his book "Asylums" (Goffman, 1961).

Goffman included under the label "total institutions" not only psychiatric institutions but also homes for the blind, aged and poor, orphanages, prisons, army barracks, concentration camps, monasteries and boarding schools. He defined a total institution (Goffman, 1961, p. xiii) as "a place of residence and work where a large number of like-situated individuals, cut off from the wider society for an appreciable period of time, together lead an enclosed formally administered round of life".

Goffman's definition indicates the characteristics shared by all these institutions (or more precisely: "organisations"). There are, however, also marked differences e.g. in (a) requirements for admission including state of health, (b) ~~recruitment~~ policies, (c) goals and objectives, (d) degree of permitted contact with the outside, (e) type and level of activity, (f) amount of social interaction permitted or encouraged between inmates and (g) prestige (see Table I.2).

TABLE I.2

VARIETIES OF "TOTAL INSTITUTIONS"

INSTITUTION	ADMISSION REQUIREMENT	RECRUITMENT POLICY	GOAL	CONTACT WITH THE OUTSIDE	LEVEL AND TYPE OF ACTIVITY	CONTACT BETWEEN INMATES	PRESTIGE OF INMATE
OLD MENTAL HOSPITALS	Mental illness, or disorder	Certification Medical referral	Treatment, protection	Limited	Limited, work, recreation	Permitted, in reality minimal	Low
MONASTERIES	Faith	Voluntary	Religious perfection	Limited	High, work, praying	High	Very high
PRISONS	Crime, deviant behavior	Court sentence, Police arrest	Punishment or reform	Very Limited	Very limited, Re-education	High, except in "isolation cells"	Low in society, Perhaps high among inmates
ARMY BARRACKS	Health, young age	Voluntary or universal conscription	Training for battle	Permitted at intervals	Very high Physical training education	Very high	High in society, Low in eyes of superiors

It must for example be noted that, although monasteries were "total institutions" in the sense that Goffman (1961) uses the term, they were different from the typical mental hospital in that (a) the requirement for admission was faith and not illness or mental disorder, (b) the recruitment was voluntary, (c) the goals were religious, (d) the degree of permitted contact with the outside was flexible, (e) the level of activity was high, (f) interaction between "inmates" was often encouraged and inspired by the same ideal and, finally, (g) the social status and prestige of the monk, at least in John Cassian's time, high.

Acedia, despite the striking similarities with institutionalism, differed in that it was a transitory state and was the result of an inner conflict between the desire to remain a monk and a reaction to the demands, restrictions and deprivation of monastic life. Instead of increasing with the length of stay in the monastery, as institutionalism of psychiatric patients increases with the length of hospitalisation, acedia disappeared when the young monk had decided to stay in the monastery or else to leave the monastic life for good. It appears that acceptance of the role of the monk, faith and commitment to monastic life were a victory over acedia.

In yet another type of institution, prisons, the state described as occurring in the inmates: "Prisonization", appears to be the adoption, by the newcomer, of habits and behaviors "appropriate" for the environment, which does not lead to impoverishment (Clemmer, 1958; Fox, 1972; Glaser and Stratton, 1972; Irwin, 1972; Peretti, 1970). It is defined by Clemmer as: "...the taking in greater or less degree of folkways, mores customs and general culture of the

penitentiary" (p. 299). Prisonization does not deprive the inmate of his own sense of identity as a person. Irwin (1972) describes how inmates commit themselves to the convict's code and never ask help from official agencies and authorities. Glaser and Stratton (1972) describe how prison inmates conform more to conventional norms in the early and late part of their prison term, while between these two phases they adopt the norms of the inmates. Fox (1972) distinguishes three phases: protest, despair and detachment. He also points to the fact that it is the inmates who run the penitentiaries, mainly because of practical necessity. Peretti (1970) sees in prisonization a loss of the "sense of worth" and a "Desocialization" resulting from a redefinition of the self-concept. Thus we see a variety of syndromes described in connection with prisons. While the concepts of Fox and Peretti approach the concept of institutionalism, Peretti is the only writer among those mentioned who describes a deeper change in the prisoner.

It appears necessary to distinguish mental hospitals which may produce institutionalism from other "total institutions" which produce a variety of psychological reactions or adaptations, such as "acedia", "prisonization" or some form of indoctrination. This is not to detract from the value of Goffman's work. Goffman's unique contribution is the fact that he is offering an entirely fresh view of the mental hospital from a, for the psychiatrist, unexpected angle of theory as well as an unexpected corner of the hospital (Goffman had spent a year in a psychiatric hospital as a remedial gymnast, spying the activities of staff and patients, according to K. Jones, 1972).

3. Psychiatric hospitals

Mental hospitals for chronic psychiatric disorders, with a long stay population, differ, not only from other total institutions but also one from another. This has been demonstrated even in Britain where there is a uniform health care system (Wing and Brown, 1961). In countries like France, where there is a "diverse ownership with complex administrative controls" (Babson, 1972, p. 4) or like U.S.A., where there is a "pluralistic system" run mainly by a "private sector, which in most of its aspects, is commercialized" (Bridgman, 1972, p. 11) the differences are naturally more pronounced.

Among the differences observed by Wing and Brown were: degree of freedom of patients, amount of occupation of patients, personal possessions of patients and optimism of nurses. Staff attitudes are a relevant variable and may differ from one member of the staff to another. Carstairs and Heron (1957) concluded that the higher the professional rank of the staff member the lower the "custodialism" in his attitude.

Psychiatric hospitals differ (one may comment) in general in the degree of emphasis they place on: (a) rest (versus activity), (b) safety (versus freedom), (c) confidentiality (versus group discussion), (d) formality (versus informality), (e) hierarchy (versus egalitarian teamwork), (f) respect for traditional practices (versus innovation), (g) guidance of the patient (versus encouragement of initiative) and (h) orderliness in running the hospital (versus self-government of patients). These dimensions are loaded with implicit value judgements and supported by ideologies but improvement in patient care is more likely to occur when the

practices are selected for particular patients and situations on the basis of valid research findings rather than ideologies.

Ideologies, however, by themselves are not irrelevant as they may create a therapeutic optimism. Behavior has been shown to be influenced by expectations (Rosenthal, 1967), and expectations appear to influence the outcome of psychiatric treatments (Frank, 1968; Goldstein, 1968; Orne, 1968). Even clinical symptomatology has been reported to vary with the expectations of the staff (Melbin, 1969).

Not only does the environment (including persons) influence patients but also patients influence the environment, or create a particular atmosphere. This, naturally, may create a vicious, or beneficial as the case may be, circle. This mechanism is even more important, at the present, when a tendency to discharge as many patients as possible tends to leave in the wards the patients who are most deteriorated. Even in countries with advanced health care systems there are still patients in mental hospitals that remind us of the old days. In a Swedish mental hospital, e.g., out of 27 schizophrenic, middle aged or old, women, 13 were mute or almost mute, 20 had enuresis and 15 encopresis. That these conditions were not incurable was demonstrated when they improved with "conventional habit training, including sociotherapy and pharmacotherapy" (Gottfries et al., 1968).

Residential institutions that take care of the mentally retarded may differ in "rigidity", "block treatment", "depersonalisation" and "social distance" (King and Raynes, 1968). Another group of patients that tend to be neglected are the geriatric patients living among younger mental patients (Reich, 1973).

One must not underestimate the impact of legal reforms

on the institutional care of psychiatric patients. For example in the U.K. the Mental Health Act of 1959 made the desegregation of the mentally ill possible (Hoenig and Hamilton, 1969, p. 2) and in the U.S.A., prevention of institutionalism was one of the aims of the Mental Health Study Act of 1955 (Joint Commission on Mental Illness and Health, 1961, p. 270).

The recent history of the concept of institutionalism

The contemporary history of the study of the adverse effects of mental hospitals started in Britain, during World War II. At that time the Mill Hill emergency hospital was set up. It was there that the concept of "therapeutic community" originated (Jones, 1968). Following the War three mental hospitals (Dingleton in Scotland, Warlingham Park and Mapperley in England) started the open-door policy (Gruenberg, 1974) and observed the beneficial effects of policies that attempted "to treat the patient as a personality" (Macmillan, 1957). Some changes had already taken place before World War II, e.g. voluntary admissions in 1930. The innovations were imported to North America in August 1954 on the occasion of the World Federation for Mental Health Conference, at Toronto (Gruenberg, 1974). As Clark (1964) indicated, the new developments originated a successful combination of administration and therapy.

Similar innovations existed in other countries earlier but failed to have an impact on health care delivery systems. In the U.S.A., e.g. Sullivan (1931) predicted that "intelligent control of the personal environments (italics added) of acutely schizophrenic individuals will lead to a greater increase in the institutional recovery rate" (italics in the original). Myerson (1939) advocated

the "total push" treatment of schizophrenia and described the "prison stupor" i.e. institutionalism of hospitalized schizophrenics.

In 1959 Barton published the first edition of his booklet on "Institutional Neurosis". Barton observed that after two years in a mental hospital many patients suffered from "apathy, lack of initiative, loss of interest, especially in things of an impersonal nature, submissiveness, apparent inability to make plans for the future, lack of individuality, and sometimes a characteristic posture and gait" (Barton, 1966). Barton included as probable causes the effect of drugs but regarded the syndrome as mainly due to psychosocial factors. For all practical purposes "institutional neurosis" must be considered as a synonym of institutionalism. Perhaps the reason that the term "institutional neurosis" was not universally adopted is due to the fact that the word "neurosis" which was coined by Cullen (who did not consider neurosis a psychogenic disorder), has at least four different meanings: (a) it refers to a group of well defined nosological entities for classification purposes (Diagnostic and Statistical Manual of Mental Disorders, 1968), (b) it has come to imply a "reactive" or psychogenic etiology (Ey et al., 1963, p. 338), (c) it suggests to some people a less severe (than psychosis) disintegration of the patient's behavior (Ey et al., 1963; Miller, 1967, p. 589), and (d) it implies inner conflict. Only the second of these meanings is applicable in Barton's "institutional neurosis".

In contrast the term "institutionalism" has some advantages: (a) It has been widely endorsed (Ochberg et al., 1972; Brown et al., 1966, p. 205), (b) It is etymologically correct. According to the

Oxford English Dictionary (1961, p. 504-505) the suffix -ism denotes (i) a process or complete action, (ii) action or conduct of a class of persons, (iii) a theory or practice, (iv) a doctrine, and (v) a peculiarity of characteristic. Three of the above accepted uses of the suffix -ism are applicable to the term "institutionalism":

"institutionalism is the result of institutionalizing a patient, it is a descriptive term for the behavior of the class of institutionalized patients and it is a peculiarity of those living in some institutions.

In the same year when Barton (1959) published his monograph, Ellenberger (1960), speaking at a meeting in Montreal, described "aliénisation" (i.e. estrangement) a concept that was used in France to describe a wide variety of reactions ranging from dependency on the hospital of recovered patients to "the most advanced stages of emotional regression and infantilism". Ellenberger compared these reactions to those of captive animals in a zoo. He also compared the visits of the public, who paid the entrance fee of one penny to the famous Bedlam Hospital in London, around the middle of the 18th century, to those of the visitors in a zoo. Similar visits of the curious public took place in the Pennsylvania Hospital in Philadelphia, where psychiatric patients were admitted since 1752 (Ziboorg and Henry, 1941, p. 578).

Others also described a variety of states, observed in long stay patients. Martin (1955) had published an article in Lancet on "Institutionalisation". Miller (1961) described catatonic, depressive, psychopathic, passive neurotic and paranoid "chronic institutional reactions". Sommer and Witney (1961), described the different steps towards "chronicity" of psychiatric patients, and a committee of the

American Public Health Association (Gruenberg, 1974) described in 1962 the "social breakdown syndrome". The "social breakdown syndrome" differs from institutionalism fundamentally as it describes a state that may be found outside institutions. The social breakdown syndrome was later defined as a measurable state by Gruenberg and his coworkers (Gruenberg et al., 1966; Gruenberg, 1974). It includes in addition to social withdrawal the element of hostility which may be expressed directly or through passivity. Wing and Brown in their book "institutionalism and Schizophrenia" prefer to use the term institutionalism "in the narrow sense" i.e. dependency or negative attitude towards discharge, and use the term "clinical and social poverty" or "secondary effects", for the impoverishment which in the present study is called institutionalism (1970, p. 86, 184, 192). In another book the same group of researchers had pointed out that "institutionalism is rarely used in a specific way but covers all the supposedly harmful effects, both social and clinical, which occur as the result of a stay in a hospital" (Brown et al., 1966, p. 205).

The multiplicity of concepts associated with the term "institutionalism" was demonstrated in a panel discussion (Ochberg et al., 1972) where the panelists talked about "failure to thrive", "regression", "acquisition of new habits", "loss of old skills", and "deterioration of interpersonal coping methods". In the same panel discussion Sabshin appropriately contrasted "institutionalization", as he called the "socialization of an individual so that he behaves appropriately in terms of the institutional mores" with "institutionalism". He defined institutionalism as an "extension" of the socialization process to the point where it ceases to be

adaptive and becomes maladaptation, so that the individual is incapable of living any more outside of the institutional setting.

In conclusion it is important to distinguish between three concepts which may overlap but are not identical: (a) a dependency on the hospital, (b) an adaptation to the environment and (c) an impoverishment. Institutionalism as the term is used in the present project refers only to the third concept.

Institutionalism is not always irreversible (Barton, 1966; Wing and Brown, 1970), and should be distinguished from deterioration due entirely to the illness itself.

This distinction is not easy to make. The majority of long stay patients in a mental hospital suffer from schizophrenia, oligophrenia or the chronic organic psychosyndromes, mainly dementias. All these conditions include in their natural history a deterioration of social behaviour and specifically schizophrenia as well as the dementias often an additional deterioration of the mental state. This explains why the "social breakdown syndrome" is defined as present even on first admission or in patients who live in the community and had never been hospitalized. In the same line Wing and Brown indicate that "some patients look 'institutionalized' at the time of admission" (Wing and Brown, 1970, p. 5). One may argue that the environment in the community may include the same undesirable psychosocial factors that existed in big old fashioned mental hospitals. However, what is due to psychosocial factors and what is due to an inherent tendency towards deterioration characteristic of an illness may be settled only by research.

SECTION B: INSTITUTIONALISM AND PREMORBID FACTORS

SECTION B: INSTITUTIONALISM AND PREMORBID FACTORS1. Etiology of institutionalism: observation and research

Seven "probable" causes of institutionalism ("institutional neurosis" according to the referred author) were reported by Barton (1966): "1. Loss of contact with the outside world; 2. Enforced idleness and loss of responsibility; 3. Bossiness of medical and nursing staff; 4. Loss of personal friends, possessions and personal events; 5. Drugs; 6. Ward atmosphere; 7. Loss of prospects outside the institution" (p. 63). Most of the causes in the above list are environmental and affect the patient's activities and his initiative.

Wing and Brown (1970) studied female schizophrenic patients, and observed a clinical syndrome, "compounded of social withdrawal, flatness of affect and poverty of speech" (p. 178) which is the result of "the social conditions under which a patient lives (particularly poverty of the social environment)" (p. 180). They also found that clinical and social poverty and dependency on the hospital often occur together and it is "difficult to disentangle the elements" (p. 184). In contrast to the above clinical syndrome "florid symptoms", i.e. "delusions, incoherence of speech and socially embarrassing behavior", were much less in evidence, in their patients, and did not improve, as did institutionalism, with the improvement of the social conditions of the patients, (p. 180).

Wing and Brown, in the same study (1970) observed also that "the longer the patient has been in hospital, the more likely she is to experience socially impoverished conditions, the more likely to be socially withdrawn and to show poverty of affect and speech, and the more

likely to be indifferent about leaving or actually to wish to stay". In contrast they noted that "florid symptomatology" e.g. delusions are "expressed less often the longer a patient has been in hospital".

Barton's observation of the effects of drugs being a factor in the etiology of institutionalism was not verified by the research of Wing and Brown.

Foster homes (or boarding homes, "foyers nourriciers" as contrasted to half-way houses) may sometimes be considered an extension of the hospital, at least when the patient, as is the general rule, does not work. They have been named the "new back wards" with some justification (Murphy et al., 1972). As it is estimated that in Canada there is "one patient in such a setting for every four in mental hospitals" (Engelsmann et al., 1974) it is necessary to examine institutionalism in foster homes (boarding homes) as well as in mental hospitals. Murphy and his associates did extensive research in foster homes and concluded that "improvement in social skills in such homes is relatively rare" (Murphy et al., 1974, 1976). The same researchers observed and measured improvement in mental symptoms in the same patients. These findings do not contradict the findings of Wing and Brown (1970), although the social environments and the types of patients in the two studies were quite different. The patients of Wing and Brown were sampled from old-fashioned hospitals which were undergoing modernisation in 1960, those of Murphy and his associates were sampled from foster homes ten years later and had been discharged from already modernised mental hospitals.

2. Premorbid factors and institutionalism

The term institutionalism carries with it the implication that

the influence of the institution is a major factor in the causation of institutionalism. The institution cannot be considered a "necessary" cause since similar states have been described outside of institutions; as mentioned earlier (p. 19) "social breakdown syndromes" are observed in patients living in the community and "some patients look 'institutionalised' at the time of admission (Wing and Brown, 1970, p. 5). Barton's "institutional neurosis" is not a term implying that institutions are the "necessary" cause for the syndrome. According to Barton "the adjective 'institutional' does not imply that institutions are the only cause of the disorder, but signifies only that institutions are the places where it was first recognised" (Barton, 1966, p. 13). Since not all long stay patients become institutionalised the institution cannot be considered a "sufficient" cause.

Vulnerability to an adverse social environment and specifically susceptibility to institutionalism is determined not only by the presence, type and severity of the psychiatric illness of the patient. It is reasonable to expect that premorbid factors may have prepared a patient for institutionalism by the time of the onset of illness. Premorbid factors may also continue to contribute to institutionalism after admission.

3. Observations on premorbid factors

Susceptibility to institutionalism has been attributed, among other things, to low intelligence (Barton, 1966). Wing and Brown formulate a number of theories, "linking schizophrenia and the social environment". According to one theory a differentiation must be made between "premorbid", "primary" and "secondary disabilities" in schizo-

phrenia (Wing and Brown, 1970, p. 16). In their extensive study of institutionalism and schizophrenia in three mental hospitals in Britain between 1960 and 1968 (in female patients) they found that "social withdrawal" shows little correlation ($r = 0.026$) with age (Ibid. p. 199). Occupation of the father, they found, plays a part "but only in selecting who is to become long-stay not in affecting the actual degree of impairment" (Ibid. p. 84). The same researchers followed their patients for four years (1960-1964) and they found considerable improvement in their patients, parallel to the improvement of the social environment. More specifically as the attitudes of the nurses improved and the time the patients are being occupied increased, the social withdrawal also decreased in each hospital. However, the improvement was not significantly related "to age, marital status or father's occupation in 1960".

Passive personality has been suggested as a predisposing factor (Ellenberger, 1960). According to Miller (1961) paranoid, depressive, catatonic, psychopathic and passive-neurotic "responses" appear in patients who, regardless of diagnosis, have the relevant traits in their premorbid personality.

"Susceptibility to emotional stress" as mentioned by Ochberg et al. (1972) and "deficiency of self-concept" (Zusman, 1966) are perhaps too broad and too ill-defined concepts to be used in research. Zusman (1966) suggests that a physical handicap or "deficient or destructive socialization experiences" may be pre-conditions for the "social breakdown syndrome".

Intelligence, education, past occupational and social achievements, special skills or talents are specific variables that

increase self-confidence and possibly strengthen a "self-concept" and reduce "susceptibility" (in the sense described by Zusman, 1966). In addition these assets induce perhaps positive attitudes (such as interest and optimism) in those individuals who live with or take care of the patient. Favorable attitudes, on the part of staff or other patients, in turn, prevent or minimize institutionalism.

implies. For the purpose of research, "predisposition" may be considered as a complex concept that needs to be broken down into several components. For example, one of the components, lack of education, if examined separately, may be found to be responsible for the "lack of information about current events" seen in an institutionalized patient, while another component may lead to "lack of initiative" in another patient living under the same circumstances.

In summary a review of observations and research findings related to the contribution of premorbid factors to institutionalism reveals the following:

The premorbid factors that are possibly associated with institutionalism include: (a) age, (b) marital state, (c) intelligence, (d) education, (e) occupation, (f) social status such as the one determined by the father's occupation, (g) physical disabilities and (h) several factors related to features of the personality of the patient (e.g. "passivity" or "submissiveness").

4. Interaction and mode of operation of premorbid factors

An overview of the eight factors enumerated above leads to several questions:

a. To what degree are these factors correlated or at least

related in some manner one to another?

b. If they tend to be related is there a sector of the general population adversely affected in general and predisposed to institutionalism specifically by the presence of several such factors?

c. Are these "premorbid" factors operating only, as their name implies, before the onset of the illness or do they operate also after the individual falls ill and perhaps also after the admission to the psychiatric hospital. Are they in fact also "extramorbid" factors?

It would seem reasonable to expect at least one of the factors to be related to every other single factor without exception. This factor is "social status of the patient". It is not determined only by the occupation of the father, though this is an important part of it, but also by the age (children, one may support, do not have as high a social status as adults), the marital state (married people perhaps tend to have a somewhat higher state), intelligence, education, occupation, physical health and personality. Social variables indeed tend to be "block booked" (Rosenberg, 1968, p. 26). The disentangling of the etiological relationship of such intercorrelated variables in a specific problem is a difficult task for the researcher and represents a relatively recent achievement of the social sciences (e.g. through the utilisation of partial correlation). Other obvious relationships between the above enumerated factors are the relationship of intelligence, education and occupation.

The sector of the general population affected more by the adverse effects of a constellation of these premorbid factors are the lower socio-economic classes. "Deprivation" or "poverty" or

"destitution" (which includes deprivations not only of financial means but also of intellectual resources, education, social influence) in its relationship to psychiatry has been recently the topic of a number of studies (Brotman, 1967; Greenblatt et al., 1967; Query, 1968; Tidmarsh and Wood, 1972). Earlier studies had correlated social class and mental illness (Faris and Dunham, 1939; Hollingshead and Redlich, 1958). The underprivileged sector of society must then provide a high number of those psychiatric patients who are pre-disposed to institutionalism. In the short review of the history of institutions it was noted that poverty in itself used to be a sufficient cause for incarceration into the same institution where mentally ill were taken. The coexistence of poverty and mental illness constitutes even today a pressing need for most societies to admit the afflicted individual to a mental hospital.

The premorbid factors, enumerated above do not only constitute a weakness or vulnerability of the individual to some forms of social or mental pathology but determine also how soon and where the patient is (a) subjected to a psychiatric examination, (b) admitted to a hospital, (c) discharged, (d) readmitted and (e) retained. They operate therefore as a selective factor in determining the composition of the population of an institution. In addition, once the individual is within the institution some premorbid factors determine the amount of contact with relatives and friends away from the institution and the amount and type of communication within the institution (with other patients and staff). They may also determine the type and amount of occupation and recreation in the institution.

5. Mode of action of each premorbid factor

Age on admission. Young individuals have had less time span for establishing long friendships, and for achieving an occupational status (with the network of social relationships that this involves), and had less years to build up participations in secondary groups (clubs, associations). On entering the long phase of hospital treatment they would then be less equipped with acquaintances, memories and relationships. The outside world for them would consist, primarily, in the family. Their dependence on the hospital, and, therefore, their propensity to be influenced by it, will thus be higher than that of older patients. For elderly people, 65 or older, the diminished contact with the outside world is due not to a lack of opportunity to form social ties but to a loss of such ties. At the age of 65, one is expected to retire. His children, nephews, nieces, and perhaps his grandchildren also, have grown up and have become independent. Old friends have gone away or died and the elderly individual becomes socially isolated. He has realistically less chance to expect a return to the community after a long hospitalization. In making future plans such persons would tend to accept suggestions originating from others. These situations may encourage not only dependency but also social impoverishment.

Celibacy. Patients who live singly, and have never been married, differ from all those married, cohabiting, separated or divorced in that perhaps they have never formed a close and deep relationship with another person. Celibacy, therefore, may in many cases imply an inability to form close interpersonal relationships. In addition the marital bond has social and psychological implications.

It involves the procreation of children, a different social life and a constellation of responsibilities and satisfactions. Marriage and work are not only the two big events and issues for every adult but also the two big steps in the road to maturity and the process of independence from the paternal family. The relationship of the patient with his parental family is quite different from that of the married patient with his (or her) spouse. It is then not surprising that in a study of the influence of family life on schizophrenic patients (Brown et al., 1972) clear differences were found between the influence of parental families on one side and spouses on the other.

Intelligence. Low intelligence may make an individual vulnerable to institutionalism by depriving him of the learning experiences (within and outside formal schooling) that other individuals have, but also be determining the occupational and social status for him. While living in an institution, perhaps the only means of contact with the outside world that a patient has may be through reading and writing letters, through books and newspapers and the deprived in intelligence person is consequently, at a clear disadvantage. Finally, some forms of treatment such as psychotherapy and treatments based on educational principles, e.g. behavior therapy, recreation therapy perhaps are not as often offered, or are less effective when offered, to intellectually deprived individuals.

Education. Closely related to intelligence is education which in similar manner influences occupation, social life, and contact with the outside world. Especially illiteracy would be expected to decrease both the choices for activity and the possibilities for communication with the outside world.

Occupational status. This determines not only social position and social life but to a great extent the financial capacity of a patient, therefore, the type of treatment, form of care and living conditions. This applies not only to the occupation of the patient but also to that of his parents. Social class was found to be related to treatment (Hollingshead and Redlich, 1958).

Some of personal possessions studied in connection with institutionalism (Wing and Brown, 1970), e.g. clothes and cosmetics are, naturally, dependent (in the life within a big understaffed, mental hospital or in a foster home) on the financial capacity of the patient. Financial capacity of the patient is a much more important factor in differentiating patients in those countries where health services and welfare measures are not developed to the degree that they are in Canada. As most of the long-stay patients, studied in this research, entered the long stay phase of their treatment at a time when Newfoundland had not achieved the present system of health care this is a relevant point.

Disabilities. The disabled in locomotion, manual ability, hearing and speech are at a clear disadvantage in comparison to the other individuals. Disability, besides determining the amount of schooling that the individual gets and his occupation or unemployment, determines also the possibility or degree of contact of the patient with the outside world, and with the other patients and the staff within the institution. Specifically speech and hearing defects are in addition incapacitating in communication. As long as institutionalism is considered the result of social understimulation, disabilities impeding communication are expected to show a strong association with

institutionalism. Disabilities such as those described above may or may not be associated with organic brain disease.

The premorbid characteristics which are hypothesized to predispose to institutionalism seem to be "block-booked" (Rosenberg, 1968), e.g. illiteracy and low intelligence tend to be often associated. This, of course, is the general rule for most social variables.

6. Premorbid factors, institutionalism and psychiatric diagnosis

The premorbid factors hypothesized to contribute to institutionalism affect the patient regardless of the diagnosis of the case. Barton in his observations on "institutional neurosis" did not classify his patients according to diagnosis. Most of the authors who described similar states, observed whole populations of long stay in-patients rather than specific diagnostic categories. In contrast research studies which attempted to measure the mental state of long stay or simply chronically sick patients were not comprehensive in diagnostic categories. The most thorough research study of institutionalism, that of Wing and Brown (1970), included only schizophrenic women. Other related research projects, were also limited to schizophrenics (Letemendia et al., 1967; Pasamanick et al., 1967; Davis et al., 1974) or excluded some categories e.g. "organics" (Michaux et al., 1969). In the careful epidemiological study of Gruenberg and his associates (1969), where not exactly institutionalism but the incidence, in the general population, of the related entity "social breakdown syndrome" was estimated, about half of the episodes, in the "acute" phase at least, were in people with schizophrenic disorders. The figure does not mean much without spelling out the diagnostic criteria for schizophrenia, but shows at least that in the U.S.A. (where the diag-

nosis of schizophrenia is used for a higher percentage of psychiatric patients than in some European countries, (Gurland et al., 1972) only half of the psychosocially handicapped patients are schizophrenic (Gruenberg et al., 1969).

It would therefore be interesting to attempt to measure institutionalism in long stay patients of all diagnostic categories.

7. Practical value of finding premorbid factors

Premorbid factors appear to constitute in more than one way a vulnerability to institutionalism and each one of the factors enumerated above may well prove to be associated with institutionalism. Findings of such associations may have some practical value. They may encourage the staff to direct their major effort of care towards those patients who because of such predispositions have the highest likelihood of becoming institutionalized. Clinical experience shows that the time and the attention of hospital staff (psychiatrists, nurses, attendants) is not equally shared among all patients. It is in practice the acute, the overactive, the demanding and the aggressive patient who gets the lion's share of the time and attention of staff in a psychiatric hospital. Institutionalized patients are exactly the opposite: chronic, underactive, compliant and submissive. Consequently they have the highest likelihood of being neglected, at least if the hospital is big and understaffed. If, on admission, or on entering the long phase of "residential" treatment in a boarding home or in a hospital ward, these patients show identifiable features of predisposition to institutionalism, perhaps their future institutionalism could be prevented by an extra care and attention devoted to them.

These premorbid factors may be at least of equal, if not of higher, importance for the management by the staff of foster or boarding homes. First the boarding homes, at least in some cases, represent the "new back wards" (Murphy et al., 1972). The larger homes, one may support, have a higher likelihood of neglecting the quiet, underactive, "low profile" patient, because of the absence of routines of nursing care. In psychiatric hospitals there are regimented bureaucratic procedures, which (dehumanising, cursory or perfunctory as they may be), bring the attention of the nurses and the other staff to each and every patient in turn. In a boarding home the landlady may feel, that she has fulfilled all her obligations once the patients are well fed, quiet, take their pills and sleep well.

a.

The history of...

The care of... at... where during the early... century was exemplary. At that time... first civilian hospital... There "old and young, healthy and... ill, were being...

CHAPTER II: MATERIALS AND METHODS

Patients between 1940 and 1950...

CHAPTER II: MATERIALS AND METHODS

1. The setting for the research: Newfoundland

The history of psychiatric care

The care of psychiatric patients in Newfoundland as elsewhere during the early decades of the 19th century was far from exemplary. At that time psychiatric patients were cared for in the first civilian hospital of Newfoundland which was built around 1813. There "old and young, healthy and sick, mentally normal and mentally ill, were eking but a miserable existence together in spartan circumstances for there were no heating facilities" (Government of Newfoundland and Labrador, 1973). The patients "were chained to walls and benches and their food was passed to them in tin containers fastened to the end of wooden poles" (Roberts, 1946).

In 1855 the first patients were moved to the hospital for psychiatric patients (later called "Hospital for Mental and Nervous Diseases" and at present "Waterford Hospital"). The conditions were not good and up to 1934 the hospital was generally considered a "public disgrace" (Government of Newfoundland and Labrador, 1973). In 1885 there were 150 psychiatric patients in the hospital (Tuke, 1973). According to a 1891 census there were 280 "lunatics" in a population of 202,000. In 1897 an Act "respecting insane persons" was passed and in 1899 occupational therapy started being used in the psychiatric hospital (called Asylum at that time). In 1934 J. Grieve was appointed administrator and introduced active treatment (Roberts, 1946). In 1953 200 beds of the local "Sanitarium" for tuberculosis were transferred to the care of psychiatric patients. In 1958 the need for psychiatric beds was still noted (Neary, 1958). The number of in-patients between 1956 and 1967 was high (343 patients "on the books"

per 100,000 population in 1967) (Statistics Canada, 1974). The more recent figures indicate the expected (from all western countries' statistics) decline in the number of inpatients. Waterford Hospital has now a rated capacity of 450 beds (Statistics Canada, 1975). These are beds offered to both short-stay and long-stay patients.

The boarding care programme

The first record of psychiatric patients from the Waterford Hospital being boarded out dates back to 1949 (Brown, 1971). At that time an arrangement, due to personal initiative, was made between a "social service worker" and a landlady willing to take in her home a small number of patients. In 1955 the programme was officially opened. Two social workers were supervising the programme until 1966, when two part-time psychiatrists undertook this responsibility. The service, however, was developed to the present extent and systematization only after 1972. Concerning the number of patients, the program grew gradually since 1955 and now serves the needs of approximately 300 patients.

The "aims" of the boarding care programme were formulated in a circular of the "Community Care Service" (1972) (i.e. the boarding care service) and are as follows: 1. "To bring the standard of the patient's functional capacity to the level where they can be re-established in the society. 2. To give the best continuous care possible to those patients who will need to remain with us for their life time. 3. To minimise readmissions to hospital which are directly related to social factors. 4. To preserve human dignity and maintain human relationships to the best of our capacity. 5. To promote public understanding which will create greater tolerance toward mentally ill people".

The offices of the service are located in the outpatient wing of the Waterford Hospital. As the staff travels continuously visiting the homes, only one half approximately of the staff is found in the hospital at one time. Those who visit: examine, treat, manage or simply talk to the patients or talk to the landladies. Those who happen to stay in the hospital: examine, treat or manage the patients referred by the landladies. They also evaluate possible candidates for boarding care, among the inpatients of the wards of the hospital, provided they are referred from a hospital psychiatrist for that purpose. They also take telephone calls from the landladies. During afterwork hours there is always a social service worker on call around the clock.

The "Community Care Service" supervises around twenty-nine boarding homes. The number varies (usually between twenty seven and thirty one homes) as homes open or close, usually because of an occasional retirement of a landlady and more rarely because a home falls below the specified standards of care. There is also one home that is not closely supervised because it involves nursing care rather than care to psychiatric patients and also because it is located at a considerable distance from the hospital. The rest of the homes are at a reasonable travelling distance (about half an hour by car) and are quite accessible as they are clustered around the communities of Conception Bay, in the majority. These homes house from 1 to 68 patients and vary considerably in the atmosphere, one from another.

2. Design of the research project

a. Objective

The main objective of the research project was to examine a number of premorbid factors as to their influence on institutionalism.

In addition, the project included a survey of long stay psychiatric patients in two different types of residential care i.e. hospital wards and (what appeared to be an extension of the hospital) boarding homes, and to determine the extent of institutionalism in each one of the two groups. A comparison of hospital wards to boarding homes, as to the degree of institutionalism or the extent of it, in order to evaluate the influence of the two settings was not one of the objectives; the two settings include selected patients and, therefore, the comparison cannot lead to any conclusion as to the effect of the setting on institutionalism.

b. Steps in the collection of material

The first step was the evaluation of the presence and the degree of institutionalism in each surveyed patient. The second step was the evaluation of the presence and the degree of vulnerability (examined separately for each premorbid factor) in each patient. Then the third step was the examination (by appropriate statistical tests) of any associations (and if possible rank correlations) linking each premorbid factor to institutionalism.

3. Hypothesis

The premorbid factors, as elaborated in the introduction, hypothesized to be associated with institutionalism were: (a) age below 18 or above 65, (b) celibacy, (c) intelligence below normal, (d) education equal or lower than three years of schooling, (e) occupational status of "unskilled worker" or unemployed in the patient himself, (f) occupational status of "unskilled" or unemployed in the father of the patient and (g) physical disability.

An additional hypothesis was that the degree of institutionalism observed in patients who are under long care will vary from zero

(for those patients who are not suffering from institutionalism) to the highest measure (for those most institutionalized). Patients in the wards were expected to have higher degrees of institutionalism on the average than patients in the boarding homes because of the selection factor.

4. Some favorable conditions for the research project in Newfoundland

A retrospective study of premorbid factors and their relationship to institutionalism appeared particularly attractive in Newfoundland for the following reasons:

- a. There is only one mental hospital for the province of Newfoundland and Labrador. The hospital keeps records of the patients in one central Record Department.
- b. The long stay patients, i.e. those most likely to suffer from institutionalism were all available for examination (as a "captive population" for research purposes) in two easily accessible settings: (i) the wards of the mental hospital and (ii) less than 30 boarding homes located at a convenient distance from St. John's.
- c. The boarding homes were supervised by hospital personnel, accepted only former patients of the mental hospital and in general appeared to be an extension of the hospital, rather than independent agencies setting their own rules of selection. The boarding homes were run under the hospital's direction and close scrutiny and, therefore, were, despite the geographic distance, more integrated with the hospital than with the community.

5. Principles in the collection of observations

For the above reasons it was decided to design a study based on one transectional (transverse) examination of the patients in the

form of a survey where information could be collected from (a) direct observation of patients, (b) from their own report, and (c) from the report of the nearest reliable informer i.e. the nurse in charge in the hospital ward or the landlady of the boarding home. The past history of the patients and an estimate of the premorbid characteristics could then be studied retrospectively through a detailed study of the records.

In order to secure a certain degree of objectivity and reliability and to reduce researcher bias, it was decided to apply the following principles:

- a. The patients ought all to be examined by the same person.
- b. The person examining the patients ought to be the researcher himself.
- c. In the review of the records of the patients only "hard" data (such as demographic variables, IQ evaluations done by qualified psychologists, dates and numbers of admissions) ought to be considered as suitable for analysis. Exception could only be made for physicians' diagnoses which, despite their known inter-observer variability, were judged as necessary for inclusion.
- d. "Clinical" impressions, anecdotal information derived from persons or records, intuitive conclusions, subjective evaluation, no matter how valuable, were to be kept apart from the main body of measurements and be used sparingly only to illustrate points.
- e. The main rating scales used as measurements for institutionalism, present amount of occupation, contact with the outside world, presence or absence of symptoms were to be selected not only among previously validated and standardised scales but also specifically among scales which had been used in populations of long stay psychiatric patients.

f. Several scales were to be used to reassure the researcher that findings are consistent even when different scales are used.

6. Measurements

The format of the item sheet

A sample of the item sheet is attached in Appendix A. The definitions and the instructions used in filling it constitute Appendix B.

Part I of the item sheet includes factual information, which was readily available in the most recent entries of the patient's record and pertained to demographic variables. Part II was filled after the examination of each case and on the basis of the patient's old record kept in the hospital. Part III encompasses the observations made during the short interview and examination of the patient and Part IV includes all the information collected from the landlady, or the nurse in charge, and is essentially a questionnaire embodying some, previously (by other researchers) used, rating scales.

The first column in the left margin of each page is the number of the variable (or "item") examined. There are 116 variables. The numbers in the next column to the right (named "columns") refer to the column of the IBM punch card. A few columns (e.g. column 10) were purposely left out so that the "dump" of the computer will be easier to read on inspection. For example, the "hospital number", variable #5, which is the serial number that identifies and locates the cases in the records of the hospital, is easy to read in the "dump" because it occupies columns 11 through 15, while columns 10 and 16 are left blank, i.e. not punched.

The selection of measurement tools

The most important concept that needed to be operationally defined for the research, was "institutionalism". As it has already been mentioned in Chapter I, (p. 20), out of the three predominant concepts, (predominant in the literature on institutionalism) namely impoverishment, adaptation and dependency (see Table II.1) the one chosen was impoverishment. It remained to decide which rating scale, from those already standardised and validated was the most suitable. Table II.1 shows that the scale of Wing and Brown (1970) named by them "social withdrawal" and that of Gruenberg (1966) named "social breakdown syndrome" best corresponded to the concept of institutionalism as impoverishment. The scale of Wing and Brown was more comprehensive. In the table the partial measures which compose the scale are listed in section A of the table under the name of the scale. These measures are: slowness, underactivity, conversation, withdrawal, interests, personal hygiene, appearance and mealtime behavior.

In detail, the rationale for preference was as follows:

First it was concluded that impoverishment was the concept that represented almost the consensus of views on what is institutionalism. It was described by the American Public Health Association as "social breakdown syndrome" (Gruenberg, 1974), by Barton (1966) as "institutional neurosis", by Ellenberger (1960) as "emotional deterioration" (or "deterioration psychique"), by Martin (1955) as "cease of suffering", by Miller (1961) as "depressive reaction", and by Sommer and Witney (1961) as "passivity". Granted, these above listed concepts are by no means identical. Still, in view of the notorious disagreement of psychiatrists, and other social scientists on most definition of psychological and social variables, the degree of agreement was

TABLE II.1

RELATIVE CORRESPONDENCE OF CONCEPTS AND MEASURES OF INSTITUTIONALISM

SECTION A) MEASURES OF SOCIAL IMPOVERISHMENT

VAR # IN THIS PROJECT	WING AND BROWN	BARTON	KATZ AND LYVERLY	GRUENBERG ET AL	OTHERS
104 (ALSO 91, & PARTLY 90)	SOCIAL WITHDRAWAL	INSTITUTIONAL NEUROSIS	WITHDRAWAL RETARDATION (ALSO GENERAL PSYCHOPATHOLOGY)	SOCIAL BREAK-DOWN SYNDROME (MAINLY PATIENT'S PARTLY TROUBLESOME BEHAVIOR)	EMOTIONAL DETERIORATION (ELLENBERGER), CEASE OF SUFFERING (MARTIN), DEPRESSIVE REACTION (MILLER) PASSIVITY (SOMMER, WITNEY)
92	SLOWNESS	SHUFFLING GAIT	MOVED SLOWLY		
93	UNDER-ACTIVITY	APATHY	JUST SAT		
95	CONVERSATION	NO INITIATIVE	QUIET	DID NOT INITIATE CONVERSATION	
96	WITHDRAWAL				
97	INTERESTS	IDLENESS	NO INTEREST	DID NO WORK, DID NO READING	
98	PERS. HYGIENE	DETERIORATION OF HABITS		HAD TO BE ESCORTED TO TOILET	
101	APPEARANCE			NEEDED HELP IN DRESSING	
102	MEALTIME BEHAVIOR			NEEDED HELP AT MEALS	
SECTION B) OTHER MEASURES OF INSTITUTIONALISM					
VAR # IN THIS PROJECT	WING AND BROWN	BARTON	KATZ AND LYVERLY	GRUENBERG ET AL	OTHERS
73	ATTITUDE TOWARDS DISCHARGE	ACCEPTANCE			NESTLING, ADAPTATION (ELLENBERGER), CEASE OF REBELLING (MARTIN) PASSIVE REACTION (MILLER) DEPENDENCE (SOMMER, WITNEY)
100 (ALSO PARTLY 90)	THREATENING OR VIOLENT BEHAVIOR	OUTBURSTS OF ANGER	BELLIGERENCE	TROUBLESOME BEHAVIOR	SOCIAL COMPETITION AND FRUSTRATION LUTTE SOCIALE (ELLENBERGER)
62		TYPICAL POSTURE			

judged satisfactory, especially for a relatively new concept.

The second decision to be made was the choice of the appropriate measure for impoverishment.

The scale "social withdrawal" of Wing and Brown (1970) corresponded closely (a) to the items included as the features of "institutional neurosis" of Barton, (b) to the relevant components of "social breakdown syndrome" as defined operationally by Gruenberg et al. (1966) and (c) to the components of the scale of Katz and Lyerly (1963). The partial measures (which added make up "social withdrawal") are listed in Table II.1, Section A. The first column indicates the number of variable in the item sheet of the present research. Variable 104 is the measure of institutionalism. Variables 92, 93, 95, 96, 97, 98, 101 and 102 are the partial measures. When the values (scores) obtained in these eight variables are added the value of institutionalism is obtained. The other columns represent the scales and concepts of other researchers and authors: the scales of Wing and Brown, the concept of Barton, the scales of Katz and Lyerly, Gruenberg et al., and other authors.

An additional reason for preference of the scale of Wing and Brown was that the scale "social withdrawal" was not only used in the past to measure what is here called "institutionalism" (or what Barton named "institutional neurosis") but also that it was found successful (Wing and Brown, 1970) and had a good inter-rater reliability and validity (Ibid., p. 30).

Another advantage of the rating scale of Wing and Brown, over other rating scales was that "social withdrawal" was analysed in eight clearly defined and measurable variables. Although each one of the variables is not necessarily of equal weight to the others, a total score can be measured by adding the individual scores, which range from 0 to 2,

and thus obtain a score from 0 to 16. It is possible, of course, to measure the "scalability" i.e. to determine to what degree the "social withdrawal" scale can be considered a Guttman scale by a number of coefficients (Nie et al., 1970). Such a task is clearly beyond the scope of the present project.

The other two most important concepts of institutionalism are the concept of adaptation and the concept of dependency. Conceptually they overlap. This overlap is apparent in what Ellenberger, e.g. calls the "nestling process" or ("processus d'adaptation") which combines dependency and adaptation. Naturally an adapted person will tend to want to stay in the environment where he has adapted. However, while adaptation is a general concept which may have different operational definitions, the dependency (or "attitude towards discharge") on the mental hospital may simply be measured by a direct question as it is done by Wing and Brown (1970). This measure was included in our "Questionnaire" and it is variable #73. However, in contrast to Wing and Brown, who consider it as the central concept of "institutionalism", in this project it is given only a minor position.

The main reason for abandoning an attempt to focus on dependency and adaptation as variables to be studied in detail and then compared to institutionalism was the following:

Adaptation is a process which is best studied longitudinally and is most obvious during the early phase of hospitalisation. Dependency and adaptation have an entirely different (and in a sense "healthier") meaning for patients living in boarding care than in patients living in the wards of a mental institution. Most of the patients studied in this project live in boarding homes. For most of them, as proven by the small

number of yearly discharges, this is a life-long arrangement. The patients do have a chance to change from home to home if they prefer so, provided the hospital staff has no objections. This means that the previous experience in the hospital, the present relationship with the landlady and the other boarders, knowledge of the conditions in other boarding homes, all enter into their final choice.

Particularly the "knowledge of other homes" would be very difficult to disentangle from other components of the attitude because these patients are allowed to visit other homes if they have a friend or a relative there. In practice they do often visit and they are informed about other homes, objectively or otherwise, by other patients whom they meet in the "Recreation Centre". Some of the patients have changed many homes before "settling" in their present home. For these reasons it was considered unfruitful to take the measurement of the "attitude towards discharge" as a central variable being "at the very heart of institutionalism" as Wing and Brown consider it (op. cit., 1970, p. 184). In addition the social withdrawal measurement had the advantage of a rating scale while the "attitude to discharge" measurement is the subjective score given to replies to questions addressed to the patient. Such a question in both ends of the range of impoverishment becomes invalid because (a) the patient who is well may be insincere (e.g. for manipulation purposes) and (b) the severely impoverished may be unable to communicate. In a population of patients where those with severe handicaps are included (e.g. severe organic psychosyndromes) the questionnaires ought to be methodologically "fair" to patients underprivileged, in means of communication. The difficulties involved in rating "attitude to discharge" were noted by Wing and Brown (1970) who

suggest that "the more extended the interview, the more difficult it is to fit the patient into categories 1 to 5" (Ibid. p. 32). Last and perhaps most important: Institutionalism (or "institutional neurosis") is a maladaptation and includes a mental and social impoverishment. A person may be adapted and dependent while being healthy, satisfied and productive. Institutionalism by definition is an undesirable state.

Although the scale "social withdrawal" measures by far better than any of the other measurements used by other researchers, the specific aspect of institutionalism which appears to be the central feature of the syndrome, the addition of other measures with appropriate weights might have increased the comprehensiveness of the measurement. This, however, could have been achieved only at the great cost of creating a composite measure of several heterogeneous variables which could have as little meaning as a measure has of, say, "general psychopathology". To use another analogy, it would be as confusing as if one had added all the scores of the M.M.P.I. scales together. In the specific case where associations are expected between a variable and some presumably independent factor the burdening, so to speak, of the variable under question with a lot of other variables (no matter how well weighted and carefully selected) cannot but obscure the originally hypothesised association.

For the above reasons "social withdrawal" was retained as the measure of institutionalism and the other measurements were kept as separate and secondary measurements.

These secondary measurements include clinical ratings of speech and mood mainly borrowed from other studies. Variables 48, 49, 52, 53, 54 and 55 are taken from Harris et al. (1967), while variables 68, 69, 70

and 71 and their composite total score are taken from Wing (1961). The "attitude to discharge" of Wing and Brown was applied in the manner used by the authors as variable 73 in this project and the ratings of Gruenberg and his associates (1966) were applied as used by the authors as variable 90 and 91 in the project. Items (variables) 94, 98, 99 and 100 of this item sheet are taken from Wing and Brown (1970) and give the composite score (variable 105) of "socially embarrassing behaviour". Finally the questions on patient's occupation during the past month, on the contact with the outside world and on the personal possessions of the patient (respectively variables 106, 107 and 108 through 116) were also administered in the manner advised by Wing and Brown (1970). The item on personal possessions constructed by Wing and Brown for female patients may be slightly unfair to men, despite some modifications made for adaptation.

Format of the scores

For purposes of easy processing the data were arranged in a form appropriate for computer analysis, and in order to make the subsequent analysis easy the following rules were applied: (a) All variables' values were numeric and integers, (b) The item sheet was constructed so that one may, in the punching cards, use "fixed columns", (c) Whenever the data were ordinal or non parametric, scores were arranged in logical order so that they implied ranking, i.e. a higher score implying a higher ranking or the opposite (a higher score implying a lower ranking), and (d) Scores were always mutually exclusive and whenever this was impossible the researcher marked the patient as having the highest of the two equally applicable scores (see Appendix B).

Sampling

The objective of the research project included a survey of the long stay patients, under residential care in the hospital wards and the hospital supervised boarding homes, in addition to the testing of the hypothesis that certain premorbid factors increased the vulnerability of patients to institutionalism. As it proved, the main setting for long stay patients were the boarding homes and the number of patients there was small enough to allow an examination of all patients. At the time of the survey the number of systematic studies of boarding homes was small considering the extent of this type of residential care in Canada and elsewhere. For the above reasons it was decided to examine the total population of boarding care patients. However, although boarding care was the predominant form of long term residential care in the province, there were still considerable numbers of long stay patients in the wards of the hospital. The patients remaining in the hospital tended, because of selection factors, to be the most institutionalised. It was, therefore, decided to include in the research project a second (and not comparable) group of patients by selecting a random sample of fifty ward patients.

a. The group of boarding home patients. As a basic initial population the researcher utilised the population of patients boarded in hospital supervised homes on October 31, 1973. There were 289 patients. There were two additional patients, nominally supervised by the mental hospital but in reality suffering from mainly physical disorders and needing nursing care, and rarely visited by the mental hospital staff. These two patients were thus obviously atypical and were excluded from the study. The 289 patients were all initially included. During the field work phase, however, 15 patients were lost for the study: 6 were discharged to the community, 5 were transferred to the care of other

agencies and 4 died. This left 274 patients who met the following criteria: (a) they were in boarding homes under psychiatric supervision, (b) they had earlier spent some time in the hospital wards, and (c) they had a minimum length of two years of residential care (whether in the hospital wards or the boarding homes). This criterion was adopted (instead of the criterion of Barton, 1966, of two years continuous residential care in the hospital wards) because the boarding homes were from the very start seen as an extension of the mental hospital. Furthermore, such a criterion is far more realistic and relevant for the present forms of care. Indeed Kedward (1974) indicated the need for adopting three criteria for what he calls "chronicity", all three criteria including a total hospitalisation of at least two years, but distinguished (a) those with continuous hospitalisation (type I), (b) those with two years of hospitalisation within the last four years (type II) and (c) those with total hospitalisation of two years within the last ten years (type III). In the same publication Kedward (1974) who has done psychiatric epidemiological research in Newfoundland reported that "in the villages of Newfoundland individuals endured the trials of schizophrenic illness "without ever being admitted to the hospital. This shows that in this province the patterns of hospitalisation are not identical with those of countries like England, or even other provinces of Canada, where the density of population is higher and the transportation facilitated by geographic or climatic condition. Criteria, therefore, for "chronicity" or "long stay care" do not appear to be easily transposable from one country to another or from one period of time to another.

With the criterion for long stay adopted for this study (i.e. a minimum length of two years of residential care, whether in the hospital

wards or in the hospital supervised boarding homes) six of the examined patients did not qualify having 22, 19, 17, 14 and 8 months only.

b. The group of hospital ward patients. The second group consisted in long stay patients who had spent a minimum of two uninterrupted years up to the time of the survey in the wards of the mental hospital. The criterion of two years was adopted to conform to the observation of Barton (1966) who concluded that "institutional neurosis" appears in patients who stayed at least two years in a mental hospital. A list of random numbers was utilised to select these patients from the total population of the mental hospital. When the random number happened to correspond to a patient who did not meet the criterion of two uninterrupted years of hospital stay, the next patient who met the criterion was taken. With this method a truly random sample of the "long stay" patients was obtained. The hospital ward patients correspond then to what Kedward (1974) has called "type I chronicity".

Because of (a) the selection process which consisted in transferring suitable patients to boarding care from the hospital wards and (b) the different criterion in the sampling, the two groups were expected to show considerable differences but these could in no sense be considered as reflecting the effect of two different environments.

On the day of sampling of hospital patients the hospital had a bed capacity of 466 beds. Out of these beds 17 were vacant. There were 439 patients (134 female and 305 male). Out of the 439 patients 113 were designated as recent admissions (49 female and 64 male). This left 326 long stay patients. The sample randomly selected represented a little less than one sixth of the total of patients residing in the long staywards of the Waterford Hospital. In the random sample there were 17 females and 33 males. The male-female proportion of the sample

is not significantly different from that of the population ($\chi^2 = 1.37$ df 1).

7. Calculation and analysis of results

The format of the Item Sheet, described in paragraph 5 of this chapter facilitated the transfer of data into IBM cards: there were only fixed columns, numeric values and integers. The computer program was selected among those available in the Statistical Package for Social Sciences (known as SPSS) (Nie et al., 1970).

8. Statistical analysis of the results

Institutionalism, the main dependent variable in this study, was measured by the "social withdrawal" scale (Wing and Brown, 1970). This scale includes eight items each of which is rated separately as 0 (normal) 1 (mild abnormality) or 2 (severe abnormality) (see p. 43 and 44) Scores on this scale are computed by simple addition of the ratings for each item and can thus range from 0-16. No weights were attached to the items by Wing and Brown and the question of modifying the social withdrawal scale to conform to a Guttman scale (Nie et al., 1970) was not attempted in this research.

For the purposes of this investigation the scores on social withdrawal were allocated to three categories: 0 (normal), 1 or 2 (borderline) and 3 to 16 (socially withdrawn) to conform to the requirements for an ordinal or ranking scale (Siegel, 1956, p. 23).

Some of the independent variables (Diagnosis, religion, etc.) correspond to measurement at its "weakest level", i.e. the nominal or classificatory scale (Siegel, 1956, p. 22).

For the above reasons the associations between independent variables and "social withdrawal" were tested for significance by non-

parametric statistical tests (χ^2 , or χ^2_c or Fisher exact probability test). As a nonparametric measure of correlation the contingency coefficient (C) (Siegel, 1956, p. 196), was used. Contingency coefficients were not compared one to another unless they were yielded by contingency tables of the same size: the upper limit of C for a 2 x 2 table is 0.707, while that of a 3 x 3 table is 0.816.

When ordinal scales were used, Kendall's tau (B or C) was the measure of rank correlation. Finally for some continuous variables (such as age of the patient) t-tests were used.

When many comparisons are made with a χ^2 test, there is a danger that some associations may be considered significant only by chance (Bahn, 1972, p. 172). This "dredging" of the data for significant results is avoided in this research by (a) limiting the number of associations between premorbid factors and institutionalism to eleven hypotheses to be tested, (b) predetermining the associations to be examined on the basis of logical relationships (never measuring associations after the collection of the data and assigning arbitrarily logical significance to chance findings), and (c) by examining in addition to the significance of the associations the contingency coefficient (C) of the association when it was appropriate.

CHAPTER III: RESULTS - THE CASE MATERIAL

CHAPTER III: RESULTS - THE CASE MATERIAL1. Demographic variables of the patients

Differences and similarities of the two groups:

The two groups of patients, that of the hospital wards and that of boarding homes, are quite different in composition, mainly because of the selection process which assigned patients to the hospital wards or to boarding homes.

A number of tables indicate the main differences.

a. Sex. Table III.1 shows that almost two thirds (59.3%) of all patients examined were male. This difference (examined by the goodness

Table III.1

Sex and Type of Residential Care

	Boarding Homes	Hospital Wards	Total
Male	160 (58.4%)	32 (64.0%)	192 (59.3%)
Female	114 (41.6%)	18 (36.0%)	132 (40.7%)
Both sexes	274 (100.00%)	50 (100.00%)	324 (100.00%)

Difference between percentage of male and female:
highly significant (p less than 0.001). Difference
between percentages of boarding home and hospital
ward type of care for each sex = not significant.

of fit chi square test) is highly significant: p less than 0.001. The high male to female difference applies to boarding homes as well as to the hospital wards (58.4% and 64% respectively). This preponderance of male patients has been observed in other North American mental hospitals. It is possible that the community tolerates the female psychiatric patients more than male patients.

The distribution of male and female patients according to the type of residential care shows that a slightly higher percentage of males are in the hospital wards than the homes, in comparison to females, but the difference is not significant.

b. Age. Table III.2 shows the number of male and female patients.

Table III.2
Age Below or Above 45

Age	Male	Female	Total
Up to 45	64 (33.3%)	33 (25%)	97 (30%)
46 and older	128 (66.7%)	99 (75%)	227 (70%)
	192 (100.0%)	132 (100.0%)	324 (100.0%)

The difference in the ages (divided into younger (up to 45) and older) of male and female patients is not significant.

The difference in the ages of male and female patients is not significant, although the male patients tend to be younger than the females. One third of the male patients belong to the "younger" age groups while only one quarter of the female patients do so. The difference is not statistically significant.

Table III.3 shows that 70% of the patients surveyed were 46

Table III.3
Age Groups According to Type of Residential Care

Age	Boarding Homes	Hospital Wards	Total
0-45 years	68 (24.8%)	29 (58.0%)	97 (30.0%)
46 and above	206 (75.2%)	21 (42.0%)	237 (70.0%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

Difference between "younger" and "older" patients in each type of residential care is highly significant
($\chi^2_c = 20.64$, p. less than 0.001)

years or older. When the boarding homes and the wards are examined separately, the boarding home patients are found to be older: 75.2% of them are 46 or older, while only 42% of the ward patients fall into these upper age groups. This difference is statistically highly significant (p less than 0.001). There are probably several factors responsible for this age difference between these two populations. If the hospital patients are more severely ill or institutionalised (a reasonable supposition in view of the selection factor described earlier) then the younger age may point to more severe illness, such as (a) severe or profound mental deficiency, and (b) chronic organic psychosyndromes occurring early in life, e.g. due to perinatal brain damage, or both. Another factor may be that the older patients happened to have run their acute, and least manageable, stage of their illness at a time when modern drug treatments and methods of management (e.g. early discharge policy) were not widely used. Such patients had recovered from the acute phase of their illness at a time when modern drug treatments and methods of management were different from the present. Still they had to stay in the hospital due to community attitudes until the boarding care programme evolved and absorbed them. Younger patients with similar conditions are now discharged, presumably to the community, after intensive treatment, thus leaving behind only those same-aged fellow patients who happen to suffer from very severe disorders. Some of the severe organic psychosyndromes appearing at an early stage of life have, in addition, short life expectancies. An additional factor may be the fact that both the staff of the boarding care programme and the landladies in the homes view old men and women as persons appropriate for boarders. Physically healthy old people, or those with mild physical

and no obvious psychiatric disorders are traditionally the individuals seen as boarders. They are not expected to work and are usually satisfied with very little. Younger people may be viewed as potential troublemakers; they are expected to work or otherwise to be in treatment. Society tends to tolerate inactivity of old people much easier than that of younger individuals.

Broken down by quinquennia and type of residential care the age distribution is seen in Table III.4. In the boarding homes the age

Table III.4

Age Distribution of the Patients in Each Setting

Age	Boarding Homes	Hospital Wards	Total
15-20	0 (0.0%)	3 (6.0%)	3 (0.9%)
21-25	4 (1.5%)	5 (10.0%)	9 (2.8%)
26-30	13 (4.7%)	7 (14.0%)	20 (6.4%)
31-35	14 (5.1%)	4 (8.0%)	18 (5.6%)
36-40	16 (5.9%)	5 (10.0%)	21 (6.5%)
41-45	21 (7.7%)	5 (10.0%)	26 (8.0%)
46-50	39 (14.2%)	4 (8.0%)	43 (13.3%)
51-55	42 (15.2%)	7 (14.0%)	49 (15.1%)
56-60	32 (11.7%)	7 (14.0%)	39 (12.0%)
61-65	38 (13.9%)	0 (0.0%)	38 (11.7%)
66-70	28 (10.2%)	0 (0.0%)	28 (8.6%)
71-75	16 (5.9%)	3 (6.0%)	19 (5.9%)
76+	11 (4.0%)	0 (0.0%)	11 (3.4%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

groups 46 to 70 represent from 10.2% to 15.2% (for each quinquennium) and as a whole 65.2% of the total. Among the ward patients the predominant age groups are: 26 to 30, 51 to 55, and 56 to 60. Each one of these three quinquennia represent 14% of the total. The age distribution in the hospital patients spreads evenly in the lower age

groups, while in the older age the frequencies drop. Only 6% of the hospital patients are older than 60, while in the boarding homes the patients older than 60 represent 34%. In Table III.5 the age dis-

Table III.5

Age Distribution of the Patients of Each Sex

Age	Male	Female	Total
15-20	3 (1.6%)	0 (0.0%)	3 (0.9%)
21-25	6 (3.1%)	3 (2.3%)	9 (2.8%)
26-30	11 (5.8%)	9 (6.8%)	20 (6.2%)
31-35	15 (7.8%)	3 (2.3%)	18 (5.6%)
36-40	12 (6.3%)	9 (6.8%)	21 (6.5%)
41-45	17 (8.8%)	9 (6.8%)	26 (8.0%)
46-50	23 (11.9%)	20 (15.2%)	43 (13.3%)
51-55	37 (19.2%)	12 (9.1%)	49 (15.1%)
56-60	18 (9.3%)	21 (15.9%)	39 (12.0%)
61-65	21 (11.0%)	17 (12.9%)	38 (11.7%)
66-70	10 (5.2%)	18 (13.6%)	28 (8.6%)
71-75	10 (5.2%)	9 (6.8%)	19 (5.9%)
76+	9 (4.7%)	2 (1.5%)	11 (3.4%)
	192 (100.0%)	132 (100.0%)	324 (100.0%)

tribution is examined separately for males and females. There is a relative preponderance of male patients in the age groups of 31 to 35 (male 7.8% of the total males against females 2.3% of the total females) and in the age group 51 to 55 (male 19.2% against 9.1% for females). The other age groups do not show striking differences.

c. Place of birth. Table III.6 shows that a little over a fifth of the patients were born in the City of St. John's. Another quarter of the total were born in the Avalon Peninsula but outside St. John's, and a little over a half were born in the remaining parts of the island of Newfoundland and Labrador; the other Canadian provinces and foreign

Table III.6
Place of Birth

	Boarding Homes	Hospital Wards	Total
St. John's	58 (21.2%)	11 (22.0%)	69 (21.4%)
Avalon Peninsula (outside St. John's)	68 (24.8%)	10 (20.0%)	78 (24.2%)
Island of Newfoundland (outside Avalon)	140 (51.1%)	26 (52.0%)	166 (51.4%)
Labrador	4 (1.5%)	1 (2.0%)	5 (1.5%)
Other Canadian Provinces	1 (0.4%)	2 (4.0%)	3 (0.9%)
Abroad	2 (0.7%)	0 (0.0%)	2 (0.6%)
	273 (100%)	50 (100%)	323 (100%)

The difference in place of birth of boarding homes and hospital ward patients is not significant.

countries contribute a very small number of patients. The difference in place of birth of boarded and hospitalised patients is not significant.

d. Religion. In the following table, Table III.7, the religious denomination of the patients is shown. The differences between the two populations of patients is not very marked, with the exception of more patients of the United Church in the Boarding Homes, (p less than 0.05). It is difficult to speculate why this should be so. The prevalent denomination amongst the patients is Roman Catholic (44.9% and 44.0%, in the boarding home and the ward patients, respectively). This is in contrast to the percentages seen in the general population where the Roman Catholics constitute, according to the 1971 census (Statistics Canada, 1971) only 36.5% of the population in Newfoundland. The difference in the percentage of Roman Catholic patients and R.C.

Table III.7
Religious Affiliation of Patients

	Boarding Homes	Hospital Wards	Total
Church of England	73 (26.6%)	16 (32.0%)	89 (27.5%)
Roman Catholic	123 (44.9%)	22 (44.0%)	145 (44.7%)
Salvation Army	15 (5.5%)	3 (6.0%)	18 (5.5%)
United Church	55 (20.1%)	5 (10.0%)	60 (18.5%)
Pentecostal	5 (1.8%)	2 (4.0%)	7 (2.2%)
Other	3 (1.1%)	2 (4.0%)	5 (1.5%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between religious affiliation of boarded and hospitalised patients is significant at the 0.05 level.

in population of the province is very highly significant. The percentage of Roman Catholics, according to previous censuses has always been in the vicinity of 33%, since 1901. Only as far back as 1857, at the first census available, Roman Catholics were as much as 45.7% of the population. One could speculate that the variable religion is associated with socioeconomic status (with Roman Catholics tending to have a lower status). The patients from poorer homes tend to remain in residential care rather than return to their families. As there is no difference between boarding home and ward Roman Catholics the possibility of the landladies' own religions being a factor must be rejected.

e. Education. About one third of the boarding home patients (30.5%) had no formal or school education at all or had less than three years of education, as shown in Table III.8. At the other end of the education range there were only 3 patients with a college degree. Among the ward patients the amount of education is even

Table III.8

Education

	Boarding Homes	Hospital Wards	All Patients	
None			56 (19.6%)	None
less than 3rd grade	73 (30.5%)	31 (66%)	48 (16.7%)	less than 3rd grade
3rd to 6th grade			95 (33.2%)	3rd to 6th grade
7th or 8th grade			48 (17.7%)	7th or 8th grade
9th or 10th grade			19 (6.7%)	9th or 10th grade
11th grade	166 (69.5%)	16 (34%)	6 (2.1%)	11th grade
College (part) or technical school			7 (2.5%)	College (part) or technical school
College			3 (1.1%)	College
Other			4 (1.4%)	Other
Total	239 (100%)	47 (100.0%)	286 (100.0%)	Total

Difference between the "uneducated" (i.e. those with less than 3rd grade) $\chi^2 = 19.78$ (p less than 0.001)

lower: those without any education at all or with less than three years of education represent 66% of the ward patients. Table III.8 shows also the percentages corresponding to the 9 categories of educational achieve-

ment examined. The total number of patients is for this variable 286, because in 38 cases there was no information regarding education. Comparisons with the general population are difficult because of the many variables entering into the final percentages. Among the patients there is a number of mentally retarded individuals. There are also many older patients who, during normal school age, had much less opportunity for readily available education.

f. Occupation. The figures on occupational groups are shown in Table III.9. Of the entire group almost half (42.7%) are classified

Table III.9

Usual Occupation of the Patients Before Admission By Sex

Occupation	Male	Female	All Patients
Professional	2 (1.2%)	5 (4.3%)	7 (2.4%)
Sales, clerical	2 (1.2%)	12 (10.3%)	14 (4.9%)
Skilled, trades	6 (3.5%)	0 (0.0%)	6 (2.1%)
Semi-skilled	6 (3.5%)	4 (3.4%)	10 (3.5%)
Unskilled (Fishing, Mining labor)	102 (59.3%)	21 (18.1%)	123 (42.7%)
Housewife	0 (0.0%)	32 (27.6%)	32 (11.1%)
No occupation	54 (31.4%)	42 (36.2%)	96 (33.3%)
Total	172 (100.0%)	116 (100.0%)	287 (100.0%)

as unskilled in occupation. In the males the figure is 59.3%. Another third of the total is classified as having "no occupation". These are the patients who never worked, and specifically in the case of female patients women who never participated in housework.

Table III.10 shows that among all the patients surveyed in this study 85.7% were unskilled workers or had no occupation at all.

Table III.10

Usual Occupation Before Admission by Type of Residential Care

	Boarding Homes	Hospital Wards	Total
Unskilled or none	182 (84.3%)	38 (92.7%)	220 (85.7%)
Skilled or Higher	34 (15.7%)	3 (7.3%)	37 (14.3%)
	216 (100.0%)	41 (100.0%)	257 (100.0%)

The difference between the two setting is not significant ($x^2 = 1.36$)

In the boarding home patients the percentage is 84.3% and in the ward patients 92.7%. These figures show that the patients examined are a population clearly skewed towards the unskilled and those never employed. The difference between boarding homes and hospital wards is not significant.

g. Marital state. Table III.11 shows that the overwhelming majority of the patients were never married. Specifically 80.3% of the boarding home patients and 92% of the ward patients. Those married or ever married

Table III.11

Marital State

	Boarding Homes	Hospital Wards	Total
Single	220 (80.3%)	46 (92.0%)	266 (82%)
Ever married...	54 (19.7%)	4 (8.0%)	58 (18%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

($x^2 = 3.18$ NS)

(i.e. widowed, divorced, separated) constitute only 19.7% of the boarded patients and 8% of the hospital patients. Compared to the figures seen among the general population this is grossly atypical. These are several

factors which may affect the distribution of patients according to the variable of marital state. Marital state is perhaps associated not only with the prevalence of psychiatric illness (Srole et al, 1962, p. 188), but also to the admission and discharge chances of a psychiatric patient from the hospital. The next table, Table III.12, shows some difference between men and women: there is a higher percentage of the ever married

Table III.12

Marital State By Sex

	Male	Female	Total
Single	169 (88.0%)	97 (73.5%)	266 (82.0%)
Married	15 (7.9%)	11 (8.3%)	26 (8.0%)
Widowed	5 (2.6%)	13 (9.8%)	18 (5.6%)
Divorced	0 (0.0%)	1 (0.8%)	1 (0.3%)
Separated	3 (1.6%)	9 (6.8%)	12 (3.7%)
Other	0 (0.0%)	1 (0.8%)	1 (0.3%)
All	192 (100.0%)	132 (100.0%)	324 (100.0%)

Difference between sexes highly significant:

$$(x^2 = 11.1 \text{ p less than } 0.001)$$

among women. The figure for the women is 26.5% while for the men it drops to 12%. The difference is highly significant ($x^2 = 11.1$ p less than 0.001). It is mainly due to widowed and separated women; perhaps widowed and separated ill women are less tolerated in the community than men with the same marital state, or alternatively perhaps women who are psychiatrically ill are more vulnerable to divorce and separation than men.

h. Father's occupation. This variable was elicited in order to gain an idea of the socioeconomic status of the patients' background.

Unfortunately the records of the patients and the admission certificates did not include, in many cases, this information. Only 48 of the 324 records contained information in this respect. Because this was suspected (during the exploratory phase of the study) the item sheet included also a direct question addressed to each patient regarding his (or her) father's occupation. Almost four fifths (78.4%) of the patients replied to the question. The percentage was higher among the ward patients (54%) than the boarding home patients (15.7%). Table III.13 shows the occupation of the father of those who replied. 66.2% of the fathers worked as fishermen, miners or as unskilled laborers. The difference between the two types of residential settings was not significant.

Table III.13

Father's Occupation

	Boarding Homes	Hospital Wards	Total
Professional	9 (3.9%)	1 (4.4%)	10 (4%)
Sales, clerical	13 (5.6%)	0 (0.0%)	13 (5.1%)
Skilled, trades	42 (18.2%)	6 (26%)	48 (18.9%)
Semi-skilled services	12 (5.2%)	2 (8.7%)	14 (5.5%)
Fishing, mining laborers	155 (67.1%)	13 (56.5%)	168 (66.2%)
None	0 (0.0%)	1 (4.4%)	1 (0.3%)
	231 (100.0%)	23 (100.0%)	254 (100.0%)

The difference between boarding homes and hospital wards is not significant.

i. Conclusion. The survey of demographic variables showed that the patient population was skewed towards the elderly, poorly educated single individual of low occupational status coming from a low economic background. The boarded patients included a higher percentage of women,

of older patients, of those with a religious affiliation to the United Church and of patients with 3rd grade or higher education, i.e. a generally higher social status and better social achievements.

2. Clinical variables

a. Mental Diagnosis. In contrast to the demographic data psychiatric diagnosis may vary from psychiatrist to psychiatrist (Gurland, 1972; Kreitman, 1961; Sheperd, 1968). The diagnosis reported here is the latest psychiatric diagnosis recorded in the patient's record. As the population studied included only long stay chronic patients, with long and repeated admissions, seen by several psychiatrists, the latest primary psychiatric diagnosis was usually a reflection of the consensus of opinion of several psychiatrists and the collective conclusion of many and long observations, confirmed by time, rather than the idiosyncratic diagnostic fashion of a single psychiatrist. Table III.14 shows the main diagnostic groups. The patients in the boarding homes suffered in the majority from schizophrenia. 159 patients (58%) had that diagnosis, as the latest record entry. In a few rare cases earlier diagnoses differed but this occurred only during the first and second hospitalisation and only if the duration of hospitalisation was short. The next big group was that of patients suffering from mental retardation, namely 56 patients (20.4%). Chronic organic psychosyndromes were the primary psychiatric diagnosis in 22 patients (8.1%) and 37 patients (13.5%) had other diagnoses.

Table III.14

Latest Psychiatric Diagnosis

	Boarding Homes	Hospital Wards	Total
Schizophrenia	159 (58.0%)	15 (30.0%)	174 (53.7%)
Mental retardation	56 (20.4%)	25 (50.0%)	81 (25.0%)
Chronic Organic psychosyndromes	22 (8.1%)	7 (14.0%)	29 (9.0%)
Other	37 (13.5%)	3 (6.0%)	40 (12.3%)
Ward patients	274 (100.0%)	50 (100.0%)	324 (100.0%)

The differences between boarding homes and hospital wards are highly significant:

$$\chi^2 = 24.0 \text{ (3df) } p \text{ less than } 0.001$$

The patients in the hospital wards had been diagnosed primarily as mental retardates. Exactly half of the patients (25 patients) had that diagnosis. The second big group 15 patients (30%) were the chronic schizophrenic patients. The next big group were the patients with organic psychosyndromes, i.e. 7 patients (14%), and the remaining patients, i.e. 3 only patients (6% only), had other diagnoses.

The differences in the distribution of diagnoses in the two groups are highly significant ($\chi^2 = 24.0$ with 3 degrees of freedom and p less than 0.001). The general conclusion appears to be that, in Newfoundland, the long stay hospital beds now tend to be reserved for mentally retarded persons while the majority of schizophrenic patients who were formerly in the hospital wards seem to be able to adjust in the environment of boarding homes (foster homes). Similar utilisation patterns of the long stay psychiatric hospital beds and boarding home beds occur in other provinces. An example is Saskatchewan, where the mental retardates are taken care of by special services, and a big mental

hospital was phased out (Stewart et al., 1968). Observations in the United Kingdom tend to conclude that some mental retardates need long-stay hospitalisation (Spencer, 1976).

It is, perhaps, of interest to examine the diagnoses in the 37 patients (13.5%) of the boarding homes and the 3 patients (6%) of the hospital wards who did not fall into any of the three above mentioned diagnostic groups. 23 of the boarded patients (8.4%) and one of the ward patients (2%) were diagnosed as suffering from affective psychoses. Also 5 boarded patients (1.8%) but none of the hospital ward patients were diagnosed as psychoneurotic. 3 boarded patients (1.1%) and one ward patient (2%) had the diagnosis of personality disorder.

b. Patterns of hospitalisation. Table III.15 shows the number of admissions to the mental hospital, including the first admission.

Table III.15

Number of admissions	Boarding Homes	Hospital Wards	Total
One	49 (17.9%)	26 (52.0%)	75 (23.2%)
Two to five	169 (61.6%)	21 (43.0%)	190 (58.6%)
Six or more	56 (20.5%)	3 (6.0%)	59 (18.2%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between boarding homes and hospital wards is highly significant
 $(\chi^2 = 27.28, df = 2, p \text{ less than } 0.001)$

About two thirds of the boarding home patients were hospitalised (from boarding care to hospital) two to five times (i.e. rehospitalised one to four times), while one fifth (20.5%) had six or more hospitalisations. 17.9% of the boarded patients had been hospitalised once, only, i.e. they had no readmissions at all but were transferred to the boarding

homes from the hospital, and stayed there.

The hospital ward patients, on the other hand were predominantly patients who, once admitted, were never discharged home or transferred to a boarding home. 52% of the hospital group belonged to this category. Those who had two to five admissions represented another 42% and only 6% of the patients in the wards had six or more hospitalisations. The differences between boarding homes and hospital wards were highly significant ($\chi^2 = 27.28$, $df = 2$, p less than 0.001). These differences are probably related to the difference in diagnoses. Schizophrenic patients tend to have readmissions while mentally retarded patients, once hospitalised will tend to stay in the hospital.

c. Duration of illness. This variable is calculated as the number of months which elapsed between the date of first psychiatric admission and the date when the patient was examined. An attempt to measure the exact duration of illness by adding to the above variable (item 28 of the item sheet, see Appendix A) the months elapsed between first psychiatric symptoms and first admission (item 27 in the item sheet) was given up for the following reasons: there were serious inconsistencies in the information contained in the commitment certificates and the admission notes or subsequent entries in the records. This is understandable because this information was collected from the disturbed patient and his relatives or from a calm but uninformed neighbour or official. Table III.16 shows that the boarded patients were almost equally divided between those with a "duration" of up to 20 years (measured in months) namely 134 patients (49%) and those with a "duration" of more than 20 years (241 months or more) namely 140 patients (51%).

Table III.16"Duration" of Illness (Months Elapsed Between
First Psychiatric Admission and Present Survey)

Months	Boarding Homes	Hospital Wards
Up to 20 years	134 (49.0%)	36 (72.0%)
More than 20 years	140 (51.0%)	14 (28.0%)
	274 (100.0%)	50 (100.0%)

The difference between boarding homes and hospital wards is significant ($\chi^2 = 9.10$, p less than 0.01)

The hospital ward patients, on the other hand, were in the majority placed in the up to 20 years duration (36 patients or 72%) group. The difference between the boarded and the ward patients is significant at the 0.01 level. This is probably due to a selection factor operating at the time of the decision to board a long stay and manageable patient and is also related to the fact that the boarded patients are generally older and tend to suffer from schizophrenia while the ward patients are generally younger and tend to be mentally retarded.

d. Cumulative length of hospitalisation. Among the patients who are now in boarding care (Table III.17) 59 patients (21.5%) were hospitalised up to 24 months, 44 (16.1%) 25 to 60 months, 55 (20.1%) 61 to 120 months, 54 (19.7%) 121 to 240 months and 62 (22.5%) patients 241 or more months. Among the ward patients 6 (12%) were hospitalised 25 to 60 months, 8 (16%) 61 to 120 months, 24 (48%) 121 to 240 months and 12 (24%) patients 241 for more months. The differences are highly significant. This shows that the ward patients who have fewer readmissions and a relatively shorter duration of illness have also a longer cumulative

Table III.17Cumulative Length of Hospitalisation

Months	Boarding Homes	Hospital Wards	Total
Up to 24	59 (21.5%)	0 (0.0%)	59 (18.3%)
25-60	44 (16.1%)	6 (12.0%)	50 (15.4%)
61-120	55 (20.1%)	8 (16.0%)	63 (19.5%)
121-240	54 (19.7%)	24 (48.0%)	78 (24.0%)
241 or more	62 (22.6%)	12 (24.0%)	74 (22.8%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between boarding homes and hospital wards is highly significant
 $(\chi^2 = 25.9, df = 4, p \text{ less than } 0.001)$

stay in hospital. This is partly due to the different composition of the two groups.

A large number of patients in a mental hospital have in addition to their mental illness some physical disorder which may constitute a disability in its own right. As hypothesised these disabilities may constitute a vulnerability to institutionalism.

e. Organic disabilities on first admission

i. Vision. There were 4 patients with moderately or severely affected vision on first admission, as shown in Table III.18. Two of the patients were in the boarding homes, representing 0.7% of all boarded patients and two in the hospital wards representing 4% of all the ward patients.

ii. Hearing. The same table shows the number of patients affected in their hearing. There were 25 such patients on first admission. In the boarding homes there were 18 (6.7%) and on the wards 7 (14%).

iii. Speech. 35 patients were affected on their first admission with

Table III.18

List of Disabilities on First Admission and Numbers
and Percentages of patients affected in the two
Settings

	Boarding Homes	Hospital Wards	Total
Vision disabilities*	2 (0.7%)	2 (4.0%)	4 (1.2%)
Hearing disabilities*	18 (6.6%)	7 (14.1%)	25 (7.8%)
Speech disabilities**	22 (8.0%)	13 (26.0%)	35 (10.8%)
Locomotion disabilities**	7 (2.6%)	9 (18.0%)	16 (5.0%)
Manual disabilities**	4 (1.4%)	9 (18.0%)	13 (4.0%)

Note: a patient may have had more than one disability on first admission

* Difference between boarding homes and hospital wards not significant

** Difference between boarding homes and hospital wards highly significant (p less than 0.001)

All differences computed by χ^2 (2 x 2 tables).

organic speech disabilities, such as stuttering or dysarthria, 22 of them in the boarding homes (8% of the boarded patients) and 13 in the wards (26% of the ward patients).

iv. Locomotion. In the same table the patient affected with moderate or severe locomotion disabilities are seen to be 16. Seven of them (2.6%) in the boarding homes and 9 (18%) in the hospital wards.

v. Manual ability. The patients affected in their manual ability made up 13,4 (1.4%) in the boarding homes and 9 (18%) in the wards.

vi. Conclusion. A high percentage of the hospital ward patients were disabled. The differences between boarding homes and wards were not significant for visual and hearing disabilities but were highly significant for speech, locomotion and manual disabilities. This probably means that these motor disabilities, in contrast to sensory

disabilities tend to keep the patient from being boarded.

f. Physical illnesses. Table III.19 shows that about 37% of the patients in each setting were suffering from chronic physical illnesses at the time of the survey. However the distribution of these illnesses was not the same in the two settings. Patients with central nervous system and sensory organs diseases

Table III.19

List of Chronic Physical Illnesses at the

Time of the Survey and Number of Patients
Affected

	Boarding Homes	Hospital Wards	Total
Neoplasms	5 (4.9%)	0 (0.0%)	5 (4.2%)
Metabolic and Endocrine	23 (22.5%)	4 (22.2%)	27 (22.5%)
Nervous system	14 (13.7%)	8 (44.5%)	22 (18.3%)
Eye, ear	5 (4.9%)	3 (16.7%)	8 (6.7%)
Cardiovascular	29 (28.5%)	2 (11.1%)	3 (25.8%)
Respiratory	11 (10.8%)	1 (5.5%)	12 (10.0%)
Gastrointestinal	8 (7.9%)	0 (0.0%)	8 (6.7%)
Other	7 (6.8%)	0 (0.0%)	7 (5.8%)
	102 (100.0%)	18 (100.0)	120 (100.0%)

The differences between boarding homes and hospital wards are significant ($\chi^2 = 20.5$, $df = 7$, p less than 0.01)

system diseases and those with sensory organ diseases tended to stay in the wards while those with the remaining illnesses tended to go to the boarding homes. The differences as shown in Table III.19 are significant at the 0.01 level. Table III.20 shows that if we regroup physical ill-

boarded and ill of the hospital Table III.20

Chronic Illnesses Affecting Mobility and Communication

	Boarding Homes	Hospital Wards	Total
Affecting mobility communication (nervous system and sensory organs diseases)	19 (18.6%)	11 (61.1%)	30 (0.25%)
Other (cardiovascular, respiratory, metabolic etc.)	83 (81.4%)	7 (38.9%)	90 (0.75%)
	102 (100.0%)	18 (100.0%)	120 (100.0%)

Differences between boarding homes and hospital wards are highly significant ($\chi^2 = 12.54$, p less than 0.001)

nesses according to whether they affect mobility and communication, those affecting mobility and communication (i.e. the diseases affecting the sensory organs and the nervous system) are more prevalent among the ward patients, than the boarded patients and the difference is highly significant.

These physical illnesses were recorded as diagnoses made in addition to the psychiatric diagnosis which could be an organic psychosyndrome. Among the boarded patients hypertension and diabetes mellitus were the two most common diagnoses.

g. Administration of drugs. At the time of the survey 233 of the 274 boarded patients were receiving psychopharmaca (85%). Among the hospital patients 45 patients (90%) were on psychopharmaca. Drugs for physical disorders or physical symptoms were administered to 32.5% of the

boarded and 26% of the hospital ward patients. The differences do not reach statistical significance.

3. Observations during the short interview with the patient.

a. Speech. Table III.21 shows the results of an evaluation of the

Table III.21

Speech

	Boarding Homes	Hospital Wards	Total
Irrelevant, incoherent, or mute	49 (17.9%)	33 (66%)	82 (25.3%)
Replies normally	225 (82.1%)	17 (34%)	242 (74.7%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between boarding homes and hospital wards is highly significant: $\chi^2 = 49.3$, p less than 0.001.

speech of the patient by the researcher. The rating is done with the scale used by Letemendia and his coworkers (1967), which was constructed carefully for use with chronic and long stay psychiatric patients (Harris et al., 1967). The scale consists in a simple evaluation of whether the patient replies coherently and relevantly (score 1) or is partially irrelevant or incoherent (score 2), irrelevant and incoherent (score 3), partially mute (score 4) and mute (score 5). The scale ought to be used only by experienced clinicians, (see Appendix A). Of the 324 patients surveyed 242 replied normally while 82 (25.3%) were irrelevant, incoherent or mute. Among the boarded patients there were 49 patients with abnormal speech (17.9%) while among the ward patients

there were 33 such patients (66%). The difference between the two residential groups is highly significant. In studies of schizophrenic patients (e.g. Wing and Brown, 1970) poverty of speech correlates highly with degree of institutionalism (in Wing and Brown's study $r = 0.603$). Evaluation of speech is less subjective than evaluation of affect. Perhaps this difference in the two groups reflects actual differences in institutionalism of the two groups.

b. Flatness of affect. Flatness of affect was measured subjectively by the examiner (see Appendix A, variable 50) and rated as normal, moderately abnormal, clearly abnormal. This is decidedly a very subjective and unreliable evaluation, but it is reported here despite of this and every caution is exercised in accepting any conclusions based on it. The boarded patients were judged as abnormal by this "measure" in 47.4% of cases, while the hospital patients in 92% of the cases. The difference is highly significant. (Table III.22).

Table III.22

Flatness of Affect

	Boarding Homes	Hospital Wards	Total
Flat	130 (47.4%)	46 (92%)	176 (54.3%)
Normal	144 (52.6%)	4 (8%)	148 (45.7%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between the two residential settings is highly significant $\chi^2_c = 32.0$, p less than 0.001.

c. "Temporal orientation". As used by Harris et al. (1967) the term refers only to the assessment of whether the patient knows the

date or not (see Appendix A). Table III.23 shows that of all the patients 57.6% know the date correctly or make only minor mistakes (up to one week). Of the boarding care patients 61% are correct or

Informed about
current events

Table III.23

"Temporal Orientation"

Serious mistakes.

	Boarding Homes	Hospital Wards	Total
Correct or minor mistakes	158 (61%)	9 (29%)	167 (57.6%)
Serious mistakes or disorientation	101 (39%)	22 (71%)	123 (42.4%)
	259 (100.0%)	31 (100.0%)	290 (100.0%)

The difference between the two settings is significant $\chi^2_c = 10.3$, p less than 0.005.

make minor mistakes while only 29% of the ward patients are correct in their answers. The difference is significant and approaches high significance (p less than 0.005). As shown earlier there were relatively more mentally retarded among the ward patients. Also a high percentage of them had organic psychosyndromes. These conditions are probably the reason for the difference.

d. General information. Table III.24 shows the number of patients who are informed about current events. The measure is used as instructed by Harris et al. (1967). More than two thirds of the boarded patients (69%) and all but one of the ward patients gave wrong answers to such simple questions as: "Who is the Premier of Newfoundland?"

Table III.24

General Information

	Boarding Homes	Hospital Wards	Total
Informed about current events	80 (31%)	1 (3.2%)	81 (27.9%)
Serious mistakes, gaps	179 (69%)	30 (96.8%)	209 (72.1%)
	259 (100.0%)	31 (100.0%)	290 (100.0%)

The difference is significant ($\chi^2 = 9.19$,
p less than 0.01).

or "Who is the Prime Minister of Canada?" and had considerable gaps in their knowledge of current news reported by both television networks and the local newspaper for several days. These percentages are underestimates because they were calculated only on the number of patients who replied at all to the question. Although some of the patients who did not reply may conceivably follow up the events but do not or cannot speak (because of negativism, muteness or some other cause) the majority of those who declined to reply were deteriorated in many respects and probably uninformed about current events as well. The previous lack of education and the long isolation from the community contribute further to the lack of information which may have been due directly to the psychiatric state of the patients. The difference between those in boarding homes and those in the wards is perhaps due both to the differences in diagnostic groupings which explains the lack of knowledge of the date but also the greater isolation of the hospital patients and their greater indifference about events, correlated perhaps with the

flatness of affect.

e. Ability to read and write. (See Appendix A, variable 78).

Each patient was examined as to his ability to read and write by being asked to write simple everyday words and to read a handwritten paragraph (and subsequently the same paragraph typed) describing the climate of the province. 88 boarded patients (33%) and 27 ward patients (71%) could not read or write anything beyond their own name. The difference between the two populations is highly significant (see Table III.25) and is probably due to both the difference in the education of the two groups and the difference in the diagnoses. Mentally retarded

Table III.25

Ability to Read and Write on Interview

	Boarding Homes	Hospital Wards	Total
Cannot read or write (except his name)	88 (33%)	27 (71%)	115 (38%)
Can read, write or both	176 (67%)	11 (29%)	187 (62%)
	264 (100%)	38 (100%)	302 (100%)

The difference is highly significant $\chi^2 = 18.47$
p less than 0.001.

patients are not only slow at learning but also tend to forget what they had learned. Also many patients with organic psychosyndromes showed a relatively advanced state of dementia.

f. Raven's Coloured Progressive Matrices. The patients were tested on the coloured version of the Progressive Matrices according to the instructions given in the Guide (Raven, 1956). Table III.26 shows that 53% of all patients scored in the 5th percentile or lower and presumably

Table III.26

Raven's Progressive Matrices

	Boarding Homes	Hospital Wards	Total
Percentile 0-5	131 (52%)	18 (69%)	149 (53%)
Percentile 6 or higher	122 (48%)	8 (31%)	130 (47%)
	253 (100%)	26 (100%)	279 (100%)

The difference is not significant $\chi^2 = 2.22$
 p less than 0.20.

would score as defectives in performance tests of intelligence. These figures, as shown in Table III.26, are drawn from 279 patients. The remaining 45 patients refused to cooperate and many among them were severely retarded or demented. The percentage therefore, is an underestimate. The hospital ward patients scored up to the 5th percentile in a higher percentage, namely 69%, to that of boarded patients, which was 52%. The difference is not statistically significant. The results of this test, which was selected as a test designed for "old people", "deteriorated" patients and as suitable for "anthropological studies" (therefore relatively "culture fair") show the low level of intellectual functioning of these long stay psychiatric patients and confirm the findings of the previous ratings. The low intelligence and the diagnoses of mental retardation or chronic organic psychosyndromes in a large number of patients explain the test results. The statistically insignificant difference is explained by the fact that almost half of the hospital ward patients (48%) refused cooperation, while among the boarded patients

the refusals were 7.7%).

8. Conclusion. Observations during the short interview with the 324 patients revealed, (as expected from the length of stay, the demographic data and the diagnostic composition) that many patients showed deterioration in speech and mood as well as a lack of general information and intellectual performance, in the majority, at the level of defectives. The patients in the hospital wards (as expected from the selection process described earlier, p. 37) had a higher percentage of patients with deteriorated speech and mood, with lack of information, illiterate and with intellectual functioning at the level of defectives.

1. Institutionalism

The reasons for selecting institutionalism as a research topic by researchers (King and Brown, 1992) are discussed in Chapter II. The results of the regression analysis are presented in Table 4.1. The results show that the regression coefficients for each of the eight variables were statistically significant at the 5% level. The results are drawn as follows:

Table 4.1: Results

CHAPTER IV: RESULTS - INSTITUTIONALISM

social institutionalism - 1992

1992

1992

CHAPTER IV: RESULTS - INSTITUTIONALISM1. Institutionalism

The reasons for selecting "social withdrawal", as used by other researchers (Wing and Brown, 1970), for measuring institutionalism were discussed in Chapter II (p. 41). Social withdrawal scores are composite scores based on simple addition of the scores obtained by rating each of the eight variables which constitute the variable "social withdrawal".

Figure 1 shows the distribution of the population of examined patients according to the values along the variable "social withdrawal". The general shape of the histogram is J shaped, a shape expected because the histogram measures a deviation from the normal. The mode is score 0, i.e. normal. The number of individuals corresponding to each score decreases as the score (i.e. the abnormality) increases. The drop is sharper at first. Because of the method of scoring, a score of 1 or 2 can be obtained by abnormality in two of the eight variables which constitute social withdrawal of a mild degree or, by abnormality of a moderate or severe degree in one only variable. For these reasons it is possible that the landlords, who know that their boarders are patients, tended to look for and to observe easily a mild abnormality in one or two of the eight constituent variables, or a severe abnormality in one only variable and, therefore, tended to score 1 or 2 in many of their boarders. For these reasons the scores 1 and 2 were considered as "borderline social withdrawal", and are handled in the analysis of data as a category separate from "normal" (i.e. score 0) as well as from "socially withdrawn" (i.e. score 3 or higher). If a patient scored 3 or higher the score was taken as clearly indicating a socially withdrawn individual. With

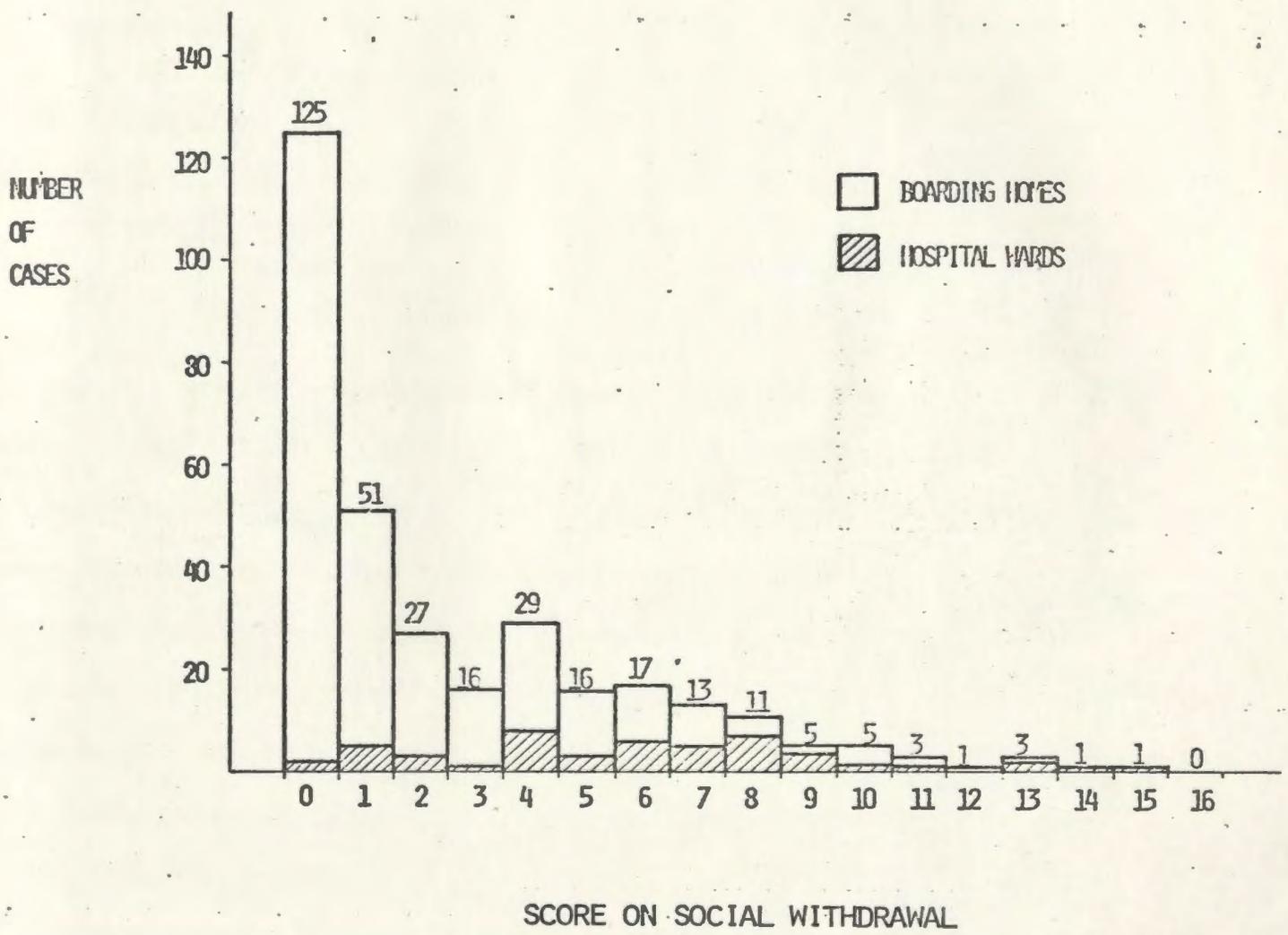


FIG. 1
DISTRIBUTION OF SOCIAL WITHDRAWAL

this classification of the patients in three categories (normal, "borderline" and withdrawn) Table IV.1 (and Fig. 2) was constructed, in

Table IV.1

Social Withdrawal by Diagnosis

	Schizophrenia	Mental Retardation	Other	All Diagnoses
Normal	74 (43%)	25 (31%)	26 (38%)	125 (39%)
Borderline	42 (24%)	13 (16%)	22 (33%)	77 (24%)
Withdrawn	58 (33%)	43 (53%)	19 (28%)	120 (37%)
All degrees of withdrawal	174 (100%)	81 (100%)	67 (100%)	322 (100%)

The difference between the different diagnostic groups is significant $\chi^2 = 14.03$, p less than 0.01.

order to examine any associations between diagnosis and social withdrawal. There were 125 normal patients (39%), 77 "borderline" (24%) and 120 "socially withdrawn" (37%); mentally retarded individuals were found to be more socially withdrawn than schizophrenic patients. The difference is significant at the 0.01 level. There were 74 patients among the schizophrenics who were normal (43%) in contrast to 25 mentally retarded (31%). If one considers only the clearly withdrawn (i.e. with score 3 or higher) 58 schizophrenics (33% of the schizophrenics) were withdrawn while among the mentally retarded there were 43 withdrawn patients representing 53% of all the mentally retarded. It is clear that mentally retarded patients show a greater prevalence of "institutionalism" than schizophrenics. This will be discussed later.

2. POSTTEST RESULTS DISCUSSION

the following table shows the results of the tests of the patients who were classified as being in the three social withdrawal categories and the diagnosis of each patient in each category is shown in the table below.

of these results is shown in the table below.

Table IV

RESULTS OF THE TESTS OF THE PATIENTS WHO WERE CLASSIFIED AS BEING IN THE THREE SOCIAL WITHDRAWAL CATEGORIES AND THE DIAGNOSIS OF EACH PATIENT IN EACH CATEGORY IS SHOWN IN THE TABLE BELOW.

TABLE IV

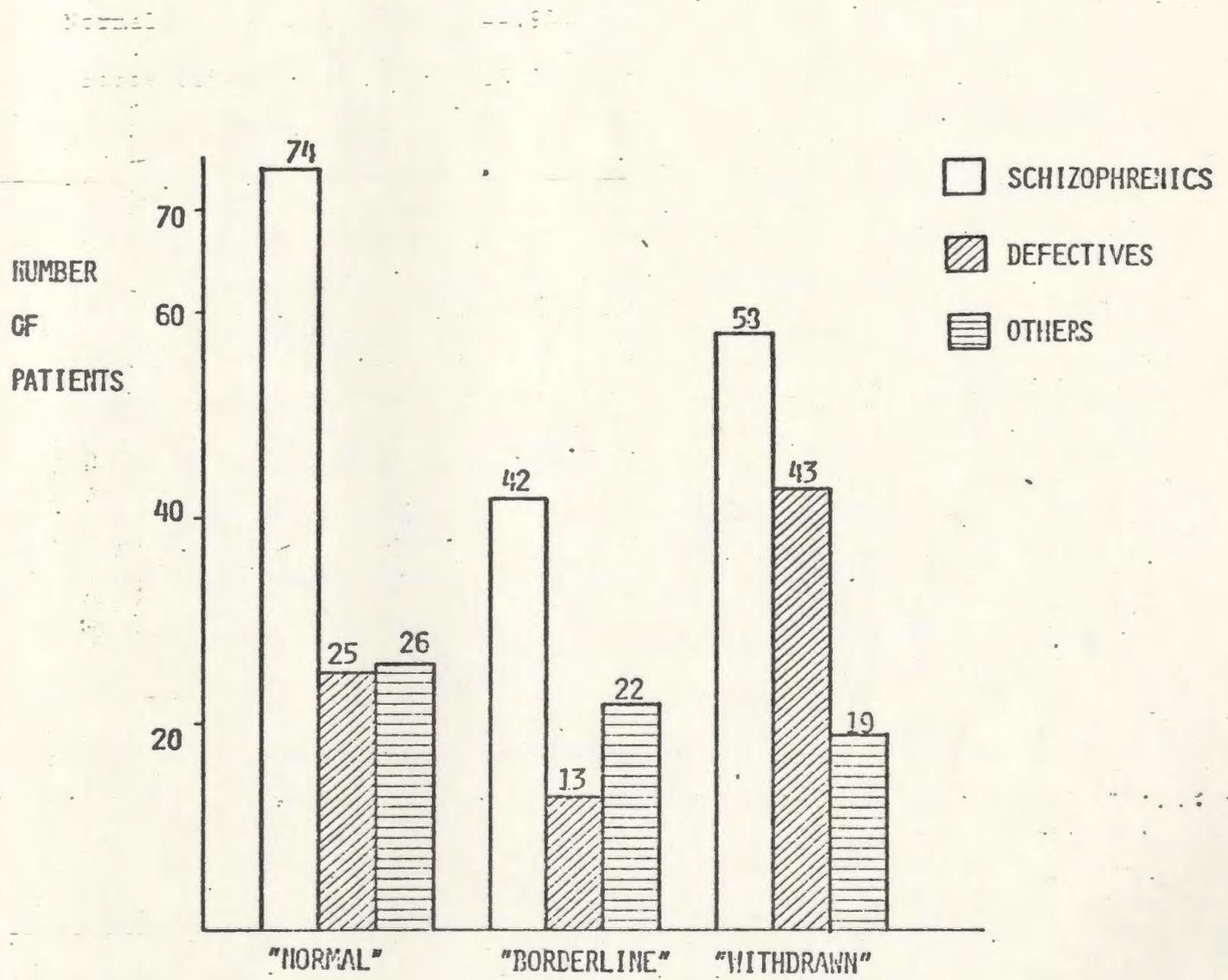


FIG. 2

SOCIAL WITHDRAWAL AND DIAGNOSIS

care offer

a. Boarding homes and hospital wards. Table IV.2 contrasts the two settings of residential care as to the degree of social withdrawal of their patients. The patients living in the hospital are by far more

Table IV.2

Social Withdrawal in the Two Populations

	Boarding Homes	Hospital Wards	Total
Normal	123 (44.9%)	2 (4%)	125 (38.6%)
"Borderline"	70 (25.5%)	8 (16%)	78 (24%)
Withdrawn	81 (29.6%)	40 (80%)	121 (37.4%)
	274 (100.0%)	50 (100.0%)	324 (100.0%)

The difference between the two settings is very significant $\chi^2 = 47.0$, p less than 0.0001

withdrawn than those living in the boarding homes. Only 2 patients (4% of the total of hospital patients) are normal in this respect as contrasted to 123 patients (44.9%) of the boarding homes. 8 ward patients (16%) are found to be "borderline" in this respect, as contrasted to 70 (25.5%) of the boarded patients. The remaining 40 patients, representing 80% of the hospital sample are clearly withdrawn, in contrast to 81 (29.6%) boarded patients who show the same degree of withdrawal. The difference is very highly significant (p less than 0.0001).

The findings illustrated in Table IV.2 show clearly that institutionalism, as defined in this study, is not a state limited to the wards of the mental hospital. Whatever the original predisposition and the causative factors resulting in institutionalism, the residential care offered in the boarding homes, although designed specifically to

counteract the ill effects of the hospital environment has not succeeded in this particular boarding programme in eradicating institutionalism. Because of the fact that the two populations are different and many selective factors operated when a patient was selected for boarding care, the difference in the prevalence of institutionalism between the two residential settings should not be taken as the result of the difference in influence of the two environments.

b. Social breakdown syndrome. As described earlier (p. 47), Gruenberg and his associates (Gruenberg et al., 1966; Gruenberg et al., 1969) have constructed a measure of impoverishment in the mental and social state of the patient, which they named "social breakdown syndrome", and used it in epidemiological studies of the whole population (Gruenberg et al., 1966; Gruenberg et al., 1969). The "social breakdown syndrome" as a concept is not confined to the results of institutionalism. On the contrary, it means any form of mental and social impoverishment due to the poverty of the social environment whether within or outside an institution. It includes variables corresponding to "social withdrawal" plus some measures of hostility. It is, therefore, interesting to apply the two measures to the same population. The social breakdown syndrome (SBS) includes two measures: (a) "Troublesome behavior" and (b) patient's function". Table IV.3 compares the scores of the patients on "social withdrawal" to those on "troublesome behavior". The scale "troublesome behavior" is apparently less sensitive than the scale "social withdrawal" as it picks up abnormalities in 67 patients while "social withdrawal" in 199 patients. That is the patient must be very deteriorated in order to score abnormal (i.e. troublesome) in the scale. According to scale "social withdrawal" 125 patients are normal. Only 1 of these 125 patients is classified as

Table IV.3

Social Withdrawal and "Troublesome Behavior"

	Troublesome	"Borderline" Troublesome	Not Troublesome	Total
Normal	1	1	123	125
Borderline	3	5	70	78
Withdrawn	26	31	64	121
	30	37	257	324

Association between scores of "social withdrawal" and "troublesome behavior" is very highly significant $\chi^2 = 84.8$, p less than 0.0001. Rank correlation by Kendall tau = 0.317

normal with the "troublesome behavior" scale and 1 more as "borderline". The association between the two measures is very highly significant (p less than 0.0001) and the rank correlation, measured by Kendall's tau 0.317.

The second measure of the "social breakdown syndrome" is called: "patients function", i.e. patient's level of functioning (see also Table II.1, p. 42). Table IV.4 compares the scores on "patient's

Table IV.4

Social Withdrawal and Patient's Level of Functioning (Rank Correlation)"Patient's Function"

	Abnormal			Normal	Total
	0	1	2	3	
Normal	0	2	7	116	125
"Borderline"	1	0	23	54	78
Withdrawn	12	9	80	20	121
	13	11	110	190	324

Rank correlation between the two scales = (Kendall tau) 0.606

function", which is the second component of the SBS (i.e. Social Break-down Syndrome) scale the one most similar to Social Withdrawal, to the scores on social withdrawal. Again "patient's function" picks up abnormalities only in 134 patients while "social withdrawal" considers as abnormal 199. It is more sensitive than "troublesome behavior". The rank correlation between social withdrawal and patient's function is 0.606 (Kendal's tau) and this compared to the correlation between social withdrawal and troublesome behavior (which is 0.317) is much higher. This is expected because of the similarity of variables measured by the scales of social withdrawal and patient's function (see Table II.1, p. 42). In order to examine the significance of association adjacent cells in the Table IV.4 must be combined because the columns "0" and "1" have low expected frequencies. Had the χ^2 test been applied to the table the results would have been meaningless (Siegel, 1956). Table IV.5 shows the same data rearranged, i.e. with columns "0" and "1" combined in one. The association is very highly significant (p less than 0.0001).

Table IV.5
Social withdrawal and "patients function"

	Function			Total
	0 to 1	2	3 Normal	
Normal	2	7	116	125
"Borderline"	1	23	54	78
Withdrawn	12	80	20	121
	13	110	190	324

Association between the scores of the two scales very highly significant $\chi^2 = 156.5$ (df = 4) p less than 0.0001

Table IV.6 separates the patients by sex along the variable

Table IV.6
Social Withdrawal by Sex

	Male	Female	Total
Normal	68 (35.4%)	57 (43.2%)	125 (38.6%)
"Borderline"	39 (20.3%)	39 (29.5%)	78 (24.1%)
Withdrawn	85 (44.3%)	36 (27.3%)	121 (37.3%)
	192 (100.0%)	132 (100.0%)	324 (100.0%)

Difference in social withdrawal of the two
sexes significant ($\chi^2 = 9.58$, p less than 0.01)

of social withdrawal. The female patients are less withdrawn: 43.2% of the females are normal as compared to 35.4% of the males and 29.5% are borderline as compared to 20.3% of males. The remaining 27.3% of the females and 44.3% of males are "withdrawn". These differences are significant at the 0.01 level. The differences may be due (a) to the fact that female patients are more occupied with household tasks and, therefore, more active and (b) to factors of selection on admission or discharge.

c. Attitude towards discharge. In Chapter II (p. 45) the reasons for not according "attitude towards discharge" the central position within institutionalism, that other researchers (Wing and Brown, 1970) have given it, were discussed. As Table IV.7 indicates there was very little association between attitude towards discharge and what in this research is taken as the main measure of institutionalism, i.e. social withdrawal. Those who wished to stay and those who wished to leave were distributed along the variable

Table IV.7"Attitude Towards Discharge" Compared to Social Withdrawal

	Wishes to stay	Ambivalent vague	Wishes to leave	Indirectly satisfied	Total
Normal	69 (41.6%)	5 (31.3%)	51 (41.1%)	0 (0%)	125 (40.8%)
"Borderline"	44 (26.5%)	2 (12.5%)	31 (25.4%)	1 (50%)	78 (25.5%)
Withdrawn	53 (31.9%)	9 (56.3%)	40 (32.8%)	1 (50%)	103 (33.7%)
	166 (100%)	16 (100%)	122 (100%)	2 (100%)	306 (100%)

Differences not significant even if the group "ambivalent, vague" is isolated and compared with the remaining patients.

social withdrawal in almost identical percentages. Even if only the small group of patients who were ambivalent or vague in their replies are compared to the remaining patients the difference does not reach significance.

d. Present degree of occupation. Table IV.8 shows the degree to which the patients are now occupied. The five categories of higher degree of present occupation i.e. domestic work, work in service departments, unsupervised work, industrial work, and outside work are combined in the table in one category to comply with the rules for the application of the x^2 statistic test (Siegel, 1956, p. 178). These four categories have the common characteristic of including only full time and responsible work. As the table shows, male patients are totally unemployed at present in a higher percentage than female patients. There are also higher percentages of relatively unemployed patients among the male patients. Specifically 30.7% of the male patients are unemployed as compared to 17.4% of female patients and

another 31.7% of male patients are almost unemployed against 22.7% of female patients being almost unemployed. The differences are highly significant statistically (p less than 0.001).

Table IV.8

Degree of Present Occupation

	Male	Female	Total
Unemployed	59 (30.7%)	23 (17.4%)	82 (25.3%)
Very little ward or home work	26 (13.5%)	13 (9.8%)	39 (12%)
Occasional occupation therapy	35 (18.2%)	17 (12.9%)	52 (16%)
Reliable washing up	34 (17.7%)	37 (28%)	71 (21.9%)
Supervised working party	12 (6.3%)	3 (2.3%)	15 (4.6%)
Daily occupation therapy	5 (2.%)	19 (14.4%)	24 (7.4%)
Competent ward work	8 (4.2%)	11 (8.3%)	19 (5.9%)
Domestic, service unsupervised, industrial or outside work	13 (6.7%)	9 (6.9%)	22 (6.8%)
	192 (100%)	132 (100%)	324 (100%)

The difference between the two sexes is highly significant: $\chi^2 = 29.41$, $df = 7$, p less than 0.001

e. Personal possessions. Another measure of the impoverishment of the life of long stay psychiatric patients is the absence of personal possessions (see Appendix A, items 108 through 116). Table IV.9 shows the percentage of the male, female and total patients who possess a certain item. There is a difference always in favor of women, who have in general more personal possessions. The difference between the number of men and women who possess the item in question reaches statistical significance for the overcoats, purses or wallets, ornaments, mirrors and nail file or scissors. Some of these items are

typically "feminine" possessions, e.g. mirrors or ornaments and the

Table IV.9

Personal Possessions by Sex

Note: Percentages are computed for each "possession"

	Male	Female	Total
Dress, suit	179 (93.2%)	127 (96.2%)	306 (94.4%)
Overcoat*	169 (88%)	128 (97%)	297 (91.7%)
Brush, comb	161 (83.9%)	120 (90.9%)	281 (86.7%)
Purse, wallet*	121 (64.4%)	111 (84.7%)	232 (72.7%)
Toothbrush	122 (63.5%)	97 (74%)	219 (67.8%)
Cosmetics	113 (59.5%)	93 (70.7%)	206 (64%)
Ornament*	64 (34.6%)	103 (79.2%)	167 (53%)
Mirror*	23 (12.8%)	79 (60.8%)	102 (32.9%)
Nail file, scissors*	44 (23.9%)	51 (40.8%)	96 (31%)

* male - female difference significant at least at levels of 0.05

difference is explained easily. Still the differences in overcoats and wallets cannot be explained in the same way and are probably due to the overall difference in the degree of social withdrawal which is seen when women and men are compared and which places males generally in worse conditions than females.

f. Contact with the outside world. Table IV.10 shows the contact with the outside world which the boarding home patients and those of the hospital wards have. It appears that 48.2% of the boarded patients and 44% of the hospital patients have no visitors and never go to their homes. Of the remaining, 24.8% of boarded patients and 40% of hospital patients have visitors only occasionally and never go home. The remaining patients have somewhat more contact with their relatives,

Table IV.10
Contact with the Outside World

Score Contact	Boarding Homes	Hospital Wards	Total
3 None	132 (48.2%)	22 (44%)	154 (47.5%)
4 Occas. visited	68 (24.8%)	20 (40%)	88 (27.2%)
6 Regul. visited	16 (5.8%)	4 (8%)	20 (6.2%)
9 Home occas.	10 (3.6%)	0 (0%)	10 (3%)
11 Home occas. plus visi- tors	24 (8.8%)	3 (6%)	27 (8.3%)
13 Home reg.	14 (5.1%)	0 (0%)	14 (4.3%)
15 Home reg. plus visi- tors	10 (3.6%)	1 (2%)	11 (3.4%)
	274 (100%)	50 (100%)	324 (100%)

The difference between the two settings is not significant
($\chi^2 = 5.76$, $df = 2$ NS)

friends and families but only 3.4% of the total number of them have regular outings home plus visitors.

It is reasonable to divide these seven categories of contact in three subgroups: i.e. (a) those with absolutely no contact, (b) those occasionally visited and (c) those regularly visited or having more contact than only regular visits. An alternative could be to divide them in two groups: those confined in their residence (score 3, 4 or 6) and those who visit their homes occasionally or more often. With the first arrangement (Table IV.10) there is no significant difference between the two residential settings. With the second arrangement (see Table IV.11) those who visit their homes are significantly more often patients in boarding homes than in hospital wards ($\chi^2 = 3.92$, $df = 1$).

Table IV.11

Visiting Their Own Homes

	Boarding Homes	Hospital Wards	Total
Not visiting their home (contact score 3, 4, 6)	216 (78.8%)	46 (92%)	262 (80.9%)
Visiting their home (contact score 9, 11, 13, 15)	58 (21.2%)	4 (8%)	62 (19.1%)
	274 (100%)	50 (100%)	324 (100%)

The difference between the boarding home and hospital ward patients is significant at the 0.05 level

$$(x^2 = 3.92, df = 1)$$

This is not surprising at all because the same reasons which keep a patient from being selected for boarding care may keep him from having the permission to go out of the hospital. It is perhaps more striking that so few of the boarded patients are visiting their own homes, i.e. only 21.1%. This may be explained by the fact that the majority of boarded patients are old, single and for these and other reasons (including their long hospital stay before being boarded) cut off socially from their communities.

g. Global impressions. In addition to the scales taken from well constructed and validated measures, utilised in previous studies of institutionalised patients, the researcher rated the general global impression of the patients along five variables which were suggested from previous descriptive studies on institutionalism (Barton, 1966; Vail, 1966). These five variables were: facial expression, posture,

dress, level of psychomotor activity and spontaneity (see Appendix A items 105, 109, 108 and 106 respectively). It was expected from the descriptive studies in the topic (and clinical experience in general) that the institutionalised patients would be apathetic in their facial expression, and have the posture described by Barton (1966), who also photographed these patients. They were, according to Barton, shambling, walking with a shuffling gait, their shoulders drooping, the head forward and the hands held across. In addition such patients would be expected to neglect their dress, having unbuttoned clothes, stains, or even, perhaps, wearing dirty clothes. During the interview they would be expected to be hypoactive and lack spontaneity. Table IV.12 shows the percentages of male and female patients showing these features. As these are subjective ratings and there was no previous validation of the scales one must not take these figures in isolation, because they do not mean much. The differences between males and females are not significant except for the neglect of dress where the male patients show more neglect.

2. Other clinical observations and ratings

a. Socially embarrassing behaviour. Socially embarrassing is measured by the same rating scale of Wing and Brown (1970) (the "ward behavior scale") which includes "social withdrawal". The original scale was described earlier (p. 47) (Wing, 1961). Factor analysis of the components of the "ward behavior scale" showed that there were two factors: "Social withdrawal" (which is used in the present research as a measure of institutionalism) and "Socially embarrassing behaviour". The latter includes four components: over-activity, laughing and talking to self, posturing and mannerisms and

Table IV.12
Global Clinical Impression

	Male	Female	Total
Facial expression (apathetic expression)	112 (59.3%)	73 (55.7%)	185 (57.8%)
Posture (shoulders dropped, head forward, hand held across, shuffling gait)	99 (51.8%)	66 (50%)	165 (51.1%)
Dress neglected*	48 (25.1%)	8 (6.1%)	56 (17.3%)
Level of psychomotor activity (hypoactivity)	44 (23.2%)	21 (16.1%)	65 (20.4%)
Spontaneity (lack of)	83 (43.9%)	50 (38.1%)	133 (41.6%)

* male - female difference is significant
(p less than 0.05)

threatening or violent behavior. As each component takes a score (value) from 0 (i.e. normal) to 2, the total measure of "socially embarrassing behavior" gives a score of 0 to 8. Table IV.13 shows the distribution of the scores in the male, female and total patients. The male - female differences are not statistically significant. No patient was behaving, at the time, in a socially embarrassing manner to such a degree as to obtain a score of 8 or 7 and there was only one patient who obtained a score of 6. Two hundred twenty six patients (69.8%) were normal in this respect. Table IV.14 compares the boarding homes with the hospital wards in this respect. As expected the ward patients show more socially embarrassing behavior than the boarded patients. Table IV.15 shows the same data rearranged, namely divided in two groups for each type of residential

Table IV.13
"Socially Embarassing Behaviour"
by Sex

	Male	Female	Total
0 (Normal)	121 (68.2%)	95 (72%)	226 (69.8%)
1	25 (13%)	14 (10.6%)	39 (12.0%)
2	22 (11.5%)	13 (9.18%)	35 (10.8%)
3	4 (2.1%)	5 (3.8%)	9 (2.8%)
4	3 (1.6%)	3 (2.3%)	6 (1.9%)
5	7 (3.6%)	1 (0.8%)	8 (2.5%)
6	0 (0%)	1 (0.8%)	1 (0.3%)
7	0 (0%)	0 (0%)	0 (0%)
8	0 (0%)	0 (0%)	0 (0%)
	192 (100%)	132 (100%)	324 (100%)

Male - female differences are not significant

Table IV.14
"Socially Embarassing Behaviour" by Type
of Residential Care

	Boarding Homes	Hospital Wards	Total
0 (Normal)	212 (77.4%)	14 (28%)	226 (69.8%)
1	31 (11.3%)	8 (16%)	39 (12%)
2	24 (8.8%)	11 (22%)	35 (10.8%)
3	4 (1.5%)	5 (10%)	9 (2.8%)
4	2 (0.7%)	4 (8%)	6 (1.9%)
5	1 (0.4%)	7 (14%)	8 (2.5%)
6	0 (0%)	1 (2%)	1 (0.3%)
7	0 (0%)	0 (0%)	0 (0%)
8	0 (0%)	0 (0%)	0 (0%)
	274 (100%)	50 (100%)	324 (100%)

Table IV.15
"Socially Embarassing" and "Normal" in
Boarding Homes and Wards

	Boarding Homes	Hospital Wards	Total
Normal	212 (77.4%)	14 (28%)	226 (69.8%)
Score 1 or higher	62 (22.6%)	36 (72%)	98 (30.2%)
	274 (100%)	50 (100%)	324 (100%)

The difference between the two residential settings is highly significant $\chi^2 = 49.6$,
 p less than 0.001

care normal and abnormal (i.e. scoring 1 or higher). While 77.4% of the boarded patients score normal the percentage of those who score normal in the hospital group is only 28%. The difference is statistically highly significant.

b. Summary. More than one third of the patients (39%) were free from institutionalism as measured by social withdrawal, 24% were "borderline" and 37% suffered from institutionalism. There was more institutionalism in mentally retarded patients than in schizophrenic patients. Those living in the hospital showed more institutionalism than those boarded in homes. When the measures of "troublesome behavior" and "patient's function" were used (measuring the "social breakdown syndrome"), a smaller percentage of patients was found abnormal. Male patients showed more institutionalism than women, in this population. Men were also less occupied during the survey time, had less personal possessions and tended to neglect their appearance more. There was less "socially embarassing behaviour (such as talking or laughing to oneself, violent behaviour than social withdrawal: about 77% of the

boarded patients and 28% of the ward patients were free from "socially embarrassing behaviour".

3. Relationship between institutionalism and premorbid factors

a. Social withdrawal and other measures of institutionalism

For reasons which were explained in Chapter II (p. 41), the concept of institutionalism which was chosen among the three different alternatives (social and mental impoverishment, adjustment reaction to a new environment and dependence on the hospital) was the concept of impoverishment. The best measure of this was the rating scale of Wing and Brown (1970): "Social withdrawal". The word "institutionalism" in this report is sometimes used as synonymous to social withdrawal although strictly speaking "social withdrawal" is only a measure of a more complex (and in its entirety not precisely measurable) state of impoverishment. Because of the central position accorded by Wing and Brown (1970, p. 184) to the dependence on the hospital as being a factor "at the very heart of institutionalism", the attitude of patients towards discharge (i.e. dependence) was also examined in the present research. As expected from the special conditions of the life of boarded patients (conditions explained in Chapter II, p. 45) this did not prove a fruitful measure. In the previous section on "institutionalism" the attitude towards discharge of patients proved unrelated to the degree of social withdrawal (see Table IV.7, p.90). On the opposite the measure of social breakdown syndrome, which measures impoverishment proved, as expected to be, correlated with "social withdrawal". Especially the measurement "patient's function" (measuring the patient's level of functioning) which includes ratings similar to those of "social withdrawal" correlated highly (Kendall's tau = 0.606,

see Table IV.4, p. 87 and Table IV.5, p. 88).

Institutionalism can also be measured by strictly "clinical measures such as speech, affect, facial expression, posture and spontaneity of behavior during the interview.

1. Speech. Table IV.16 shows abnormalities of speech such as

"Borderline"

66

(27.3%)

Table IV.16

Withdrawn

Speech and Social Withdrawal (Original Table

Speech

	Relevant Coherent	Partly relevant or coherent	Irrelevant or incoh.	Partly mute	Mute
Normal (not with- drawn)	122 (50.4%)	1 (3.8%)	0 (0%)	1 (3.4%)	1 (4%)
"Border- line"	66 (27.3%)	6 (23.1%)	0 (0%)	5 (17.2%)	1 (4%)
Withdrawn	54 (22.3%)	19 (73.1%)	2 (100%)	23 (79.4%)	25 (92%)
	242 (100%)	26 (100%)	2 (100%)	29 (100%)	25 (100%)

Kendall's tau = 0.33382, very high significance:

p less than 0.00001

irrelevancy and incoherence or mutism as measured by Harris et al. (1967) in long stay chronic psychiatric patients. The correlation between speech abnormality and social withdrawal is very high (Kendall's tau = 0.33382 significance very high, p less than 0.00001). The association is also highly significant: Table IV.17 shows the same figures in condensed form in order to apply the χ^2 test, i.e. the numbers of patients with irrelevant, incoherent partly mute and mute speech are combined in one cell for each degree of social withdrawal. The association is highly significant.

Table IV.17Speech and Social Withdrawal (Condensed)

	Normal speech	Partly Normal	Abnormal
Normal (not withdrawn)	122 (50.4%)	1 (3.8%)	2 (3.6%)
"Borderline"	66 (27.3%)	6 (23%)	6 (10.7%)
Withdrawn	54 (22.3%)	19 (73%)	48 (85.7%)
	242 (100%)	26 (100%)	56 (100%)

Difference in social withdrawal between those normal, partly normal or abnormal in speech highly significant ($\chi^2 = 97.975$, $df = 4$, p less than 0.001)

ii. Flatness of affect. Table IV.18 shows the association of

Table IV.18Flatness of Affect by Social WithdrawalAffect

	Normal affect	Moderately flat	Severely flat	Total
Normal (not withdrawn)	77 (52%)	47 (37.3%)	1 (2.2%)	125 (39.2%)
"Borderline"	46 (31.1%)	26 (20.6%)	4 (8.9%)	76 (23.8%)
Withdrawn	25 (16.9%)	53 (42.1%)	40 (88.9%)	118 (37%)
	148 (100%)	126 (100%)	45 (100%)	319 (100%)

$\chi^2 = 79.9$, $p = 0.0000$ Kendall's tau = 0.3696
 p less than 0.00001

flatness of affect and social withdrawal. The association is very highly significant. Only one patient is judged as having severely flat affect while at the same time he is classified as normal or not "withdrawn". Out of the 45 patients who are judged as severely flat in affect 40 patients (88.9%) are also "withdrawn". The rank correlation is also very highly significant (Kendall's tau = 0.3696, p less than 0.00001).

iii. Facial expression. Table IV.19 shows that even a simple rating

Table IV.19

Facial Expression and Social Withdrawal

	Normal	Facial Expression		Withdrawal
		Moderately inexpressive	Markedly inexpressive	
Normal "not withdrawn"	79 (58.1%)	44 (36%)	2 (3.2%)	125 (38.9%)
"Borderline"	36 (26.5%)	36 (29.5%)	6 (9.5%)	78 (24.3%)
Withdrawn	21 (15.4%)	42 (34.5%)	55 (87.3%)	118 (36.8%)
	136 (100%)	122 (100%)	63 (100%)	321 (100%)

Kendall's tau = 0.4452, $\chi^2 = 101.64$, df = 4,
p less than 0.001

of the facial expression can determine in more than half of the patients the presence of some degree of institutionalism. Only 2, out of these patients who were judged as inexpressive proved to be free of social withdrawal while another 6 patients of the same category proved to be "borderline in social withdrawal". The remaining 55 patients with marked lack of expression in the face were found to be "withdrawn". The

rank correlation of the two measures was very highly significant (Kendall's tau - 0.4452, p less than 0.00001, $\chi^2 = 101.6$, p less than 0.001).

iv. Posture. Table IV.20 shows the relationship between the

Table IV.20

Posture

	Abnormal				
	Normal	1	2	3	4
"Not withdrawn"					
- Normal	93 (58.5%)	26 (27.4%)	3 (8.3%)	1 (5.6%)	0 (0%)
"Borderline"	37 (23.3%)	28 (29.5%)	7 (19.4%)	2 (11.1%)	0 (0%)
Socially with- drawn	29 (18.2%)	41 (43.1%)	26 (72.2%)	18 (100%)	3 (100%)
	159 (100%)	95 (100%)	36 (100%)	18 (100%)	3 (100%)

Kendall's tau 0.37197. By combining the three last columns $\chi^2 = 76.6$ (df = 4) p less than 0.001

rating of social withdrawal and a rating of posture. The rating of posture is not taken from a standardised and validated scale. It consists simply in noting whether one or more of the four features of the posture of "institutionalised" patients does or does not appear in a particular patient (Appendix A, item 62). These features are: drooping shoulders, head held forward, hands held across, shuffling gait, and correspond to the description and photographs published by Barton (1966). There is a highly significant correlation between "social withdrawal" and posture of institutionalism (Kendall's tau = 0.37197. By combining the three last columns (i.e. those with 2, 3, or 4 features of "institutional posture" together one may apply the χ^2 test. The result

is a highly significant association ($\chi^2 = 76.6$, p less than 0.001).

v. Spontaneity. Table IV.21 shows the relationship between a rating of spontaneity, which is a "clinical", subjective estimate based on the clinical experience of the researcher and not on a

itself. Table IV.21

Table IV.21
Spontaneity and Social Withdrawal

	SPONTANEITY			Total
	Normal	Moderately lacking	Severely Lacking	
Normal	98 (52.4%)	25 (29.8%)	1 (2.1%)	125 (38.9%)
"Borderline"	54 (28.9%)	20 (23%)	4 (8.5%)	78 (24.3%)
Withdrawn	35 (18.7%)	41 (47.1%)	42 (89.4%)	118 (36.8%)
	187 (100%)	86 (100%)	47 (100%)	321 (100%)

$\chi^2 = 87.8$, p less than 0.001. Kendall's tau = 0.399

standardised and validated scale (Appendix A, item 57). Again this variable proves to be associated to a highly significant degree to the results of social withdrawal ($\chi^2 = 87.8$, p less than 0.001) and the rank correlation is again highly significant (Kendall's tau = 0.399, p less than 0.00001).

b. Social withdrawal and partial scores

The scale "social withdrawal" was a derivation after factor analysis from the "ward behavior" scale. It was constructed and validated by Wing and Brown (1970). These investigators (who used both parametric and nonparametric statistics whenever there was any skewing, to reassure themselves that the significance was of similar degree), compared populations of patients by F ratios (Wing and Brown, 1970, p. 94). The rank correlations with some other measures give some

support to the conclusion that the scale is valid enough for the purpose for which it has been used in this research.

It remains to examine the relationship between the ratings in the items which compose "social withdrawal" and social withdrawal itself. Table IV.22 shows this relationship. All partial measures

Table IV.22

Correlation of Social Withdrawal and Partial Scores

	Kendall's tau
1. Slowness of movement	0.24826
2. Underactivity	0.43370
3. Conversation	0.51177
4. Social withdrawal, specifically	0.52246
5. Leisure interests	0.54498
6. Personal hygiene	0.12057
7. Personal appearance	0.61760
8 Behavior at meal times	0.11503

show an association by χ^2 significant at the level of very high significance. In addition, the rank correlations are high, especially for "personal appearance" (Kendall's tau (0.61760), "amount of leisure interests" (tau = 0.54498), and "social withdrawal specifically", i.e. lack of social mixing, (Kendall's tau 0.52246). Using the term "social withdrawal" to mean both the scale as a whole and the component "lack of mixing" may be considered confusing. However, this usage follows the practice of the researchers who constructed the scale (Wing and Brown 1970).

The variable which shows the least correlation is "behavior at meal times" (tau 0.11503). Indeed 303 out of the 324 patients are

normal in their behavior at meal times. Out of the remaining 21 patients who show some abnormality at meal time 20 patients are classified as "withdrawn" in the social withdrawal scale and 1 as "borderline". Behavior at meal times (need of the patient to be spoonfed or supervised) may be correlated with the presence and the degree of neurological disorders rather than institutionalism.

4. The main hypotheses: Institutionalism and premorbid factors

In order to test the main hypotheses about the relationship of premorbid factors to institutionalism the scale of social withdrawal was used broken down into "normal", "borderline", and "socially withdrawn". For the premorbid factors a simple dichotomy was used between the presence and the absence of the premorbid factor in question. The presence or absence of a premorbid factor was determined with criteria defined before the collection of the data i.e. during the original design of the research project. With these categories 2 by 3 crosstabulations were constructed, associations tested by the chi square test and significances determined. A minimum level of probability (at level of p less than 0.05) was required before accepting any association as significant.

When many comparisons (of the same dependent variable with a large number of variables) are made with a x^2 test, there is a danger that some of the associations may be considered significant only by chance (Bahn, 1972, p. 172). This "dredging" of the data for significant results is avoided in this research by (a) limiting the number of associations to only eleven hypotheses of associations between premorbid factors and institutionalism (b) predetermining the associations to be examined on the basis of logical relationships

(never measuring associations after the collection of data and assigning arbitrarily logical significance to chance findings), and (c) by examining in addition to the significance of the associations the contingency coefficient ("C") of the association (Siegel, 1956, p. 196).

a. Age as a premorbid factor. As discussed in Chapter II (page 37) age on admission was expected to constitute a premorbid vulnerability to institutionalism if the patient was too young or too old, i.e. if he was twenty years or younger or 65 years old and older. Table IV.23 shows that the differences between these two different age

Table IV.23

Institutionalism and Age on Admission

Age

	Younger than 21 older than 64	21 to 64	All Ages
Normal	25 (32.9%)	100 (40.3%)	125 (38.6%)
"Borderline"	19 (25%)	59 (23.8%)	78 (24.5%)
Withdrawn	32 (42.1%)	89 (35.9%)	121 (37.3%)
	76 (100%)	248 (100%)	324 (100%)

The difference in institutionalism between the two age groups is not significant: $\chi^2 = 1.46957$,

NS

groups do not reach the levels of significance. One possible explanation is that the younger age groups constitute only a small number (3 patients). It is still possible that the patients admitted at a younger age are more vulnerable. If the population studied had included more patients of young age an association might have been observed. The older patients are represented in adequate numbers but

another factor possibly enters here. The patients who are now 65 or older entered the hospital at a time when the hospital policies and the community attitudes made it likely that even relatively mild cases were retained in the hospital. This is supported by the fact that the average years elapsed between admission to the mental hospital and the present survey is 20 years and 10 months. The older patients were probably, as a rule, admitted earlier than the middle fifties when neuroleptics were introduced. These older patients were really residents in the hospital because of the policies and practices rather than their real needs. When the new policies of discharge started they were too old to return to their families or the community at large and appeared to be the best candidates for boarding care. This interpretation gains further support from the fact that the distribution of age among the boarding homes and the hospital wards shows that the older age groups are to be found primarily in the boarding homes (Table III.3). While 34% of the boarded patients are 61 or older, only 6% of the ward patients are 61 or older.

b. Institutionalism and intelligence. The hospital records did not include psychometric tests of intelligence in sufficient number to allow conclusions. Only in 89 patients (out of the total of 324) psychological tests had been done to determine the IQ. In addition the utilisation of the IQ psychometric tests was selective, being applied not to those patients where the mental retardation was obvious to the psychiatrist but to some psychotic or chronic brain damaged patients where there was some diagnostic problem, often due to the combination of low intelligence with another psychiatric disorder. In the absence of records of psychometric tests, the alternative re-

ained to use tests at present with the assumption that the conclusions at present reflect the IQ of the patient on admission. There are of course some conditions such as the progressive dementias where an intellectual deterioration is present by definition.

The organic psychosyndromes constitute only 9% of the total cases (29 cases) and not all of them show a progressive deterioration of intellectual powers. It is possible that a drop in the scores of tests of intelligence occurs in other cases as well. In schizophrenia, e.g. there is some intellectual deficit during the first two years of the process but little change afterwards (Foulds and Dixon, 1962) although this is a controversial topic. Even in the case where a sufficient number of cases who were examined psychometrically soon after admission had been available, there would have been little chance of having a precise idea of the premorbid IQ of admitted patients (Davis et al., 1972). This is because IQ tests done in severely disturbed patients soon after admission are usually underestimates due to the confused and disturbed state of the admitted patient. Most admissions in this mental hospital at earlier periods were in such a state. Retrospective estimate of intellectual powers was the only alternative left.

Table IV.24 shows the association of the results on the Raven's Progressive Matrices, Coloured set, in 279 out of the 324 patients. The missing cases were patients so deteriorated, uncooperative or mentally retarded, that repeated explanations failed to give them an idea of the task required, or who bluntly and adamantly refused to participate. More than half of the patients scored at the defective level, i.e. up to the 5th percentile. There were 55 (36.9%) of the

defective patients who were classified as not institutionalised, while the corresponding figure among the patients with normal intelligence was 51.5%. The defectives who were "socially withdrawn" were 39.6% while the normal in intelligence who were withdrawn were only 18.5%. The differences were highly significant $p = 0.0006$. The contingency coefficient between the two variables was $C = 0.22538$.

Table IV.24
Institutionalism and Intelligence

	5th percentile ("defective")	Above 5th percent- tile (normal in intelligence)	All
Normal	55 (36.9%)	67 (51.5%)	122 (43.7%)
"Borderline"	35 (23.5%)	39 (30%)	74 (26.5%)
Withdrawn	59 (39.6%)	24 (18.5%)	83 (29.7%)
	149 (100%)	130 (100%)	279 (100%)

The difference in institutionalism between "defective" and normal in intelligence was highly significant $\chi^2 = 14.93091$, $p = 0.0006$
 $C = 0.22538$

c. Institutionalism and education. As intelligence determines a limit on education it is important to see whether a possible association between institutionalism and education gives any support to the hypothesis of an association between institutionalism and intelligence. Table IV.25 shows the findings. Fortunately, in 286 cases (88% of all subjects) there was information about the education of the patient. 104 patients had an education of less than three grades of school while 182 patients had received at least a third grade education. Only 26% of the uneducated were free from institutionalism while among those

Table IV.25
Institutionalism and School

	Less than 3rd grade	3rd grade or more	All
Normal	27 (26%)	87 (47.8%)	114 (39.9%)
"Borderline"	21 (20.2%)	50 (27.5%)	71 (24.8%)
Withdrawn	56 (53.8%)	45 (24.7%)	101 (35.3%)
	104 (100%)	182 (100%)	286 (100%)

Difference in institutionalism between "educated" and "not educated" very highly significant
 $\chi^2 = 25.22$, p less than 0.00001, Contingency coefficient 0.2847

educated the percentage was 47.8%. The percentages were practically reversed in the case of withdrawn patients. Of the uneducated 53.8% were withdrawn, while among the educated the percentage of withdrawn was 24.7%. The association is very significant, p less than 0.00001, and the contingency coefficient: 0.2847. If the literacy of the patients on admission is compared to institutionalism, as it is shown in Table IV.26, the association between illiteracy and institutionalism

Table IV.26
Institutionalism and Literacy on Admission

	Illiterate	Literate	All
Normal	22 (23.9%)	82 (48.8%)	104 (40.0%)
"Borderline"	15 (16.3%)	46 (27.4%)	61 (23.5%)
Withdrawn	55 (59.8%)	40 (23.8%)	95 (36.5%)
	92 (100%)	168 (100%)	260 (100%)

Difference in institutionalism of literates and illiterates very highly significant $\chi^2 = 33.37$, p less than 0.00001, Contingency coefficient = 0.33728

appears even stronger (the contingency coefficient is higher). There were 59.8% of institutionalised patients among the illiterates, while the percentage of institutionalised patients among those capable of reading and writing (on admission) was only 23.8%. The association is again very highly significant: p less than 0.00001, contingency coefficient $C = 0.33728$. The results are also confirmed by a highly significant association p less than 0.001 between the present ability to read and write (as tested by the researcher himself during the interview) and the degree of institutionalism.

As a high number of patients suffer from mental retardation, it is possible that this association may be in essence an association between mental retardation and institutionalism. Mental retardation as a condition may predispose to institutionalism not through lack of education but through some other vulnerability inherent in it. It is, therefore, important to examine our patients in two separate groups. Table IV.27 examines the mentally retarded. Although the illiterate

Table IV.27

Institutionalism and Illiteracy for Mentally Retarded Only Patients

	Illiterates		Literates		All
Normal	11 (20%)		6 (50%)		17 (25.4%)
"Borderline"	44	10 (18.2%)	6	1 (8.3%)	1 (16.4%)
Withdrawn	(80%)	34 (61.6%)	(50%)	5 (41.7%)	39 (58.2%)
	55 (100%)		12 (100%)		67 (100%)

The difference in institutionalism between illiterate and literate mental defectives is not significant
 $(\chi^2 = 3.33$ with $df = 1)$

mental defectives show a higher percentage of institutionalised patients than literate mental defectives (61.6% of illiterates versus 41.7% of

literate) the difference is not significant ($\chi^2 = 3.33$ with 1 degree of freedom: the numbers are too small for a 2 by 3 table). In the remaining 191 cases, i.e. the patients where the diagnosis is not mental retardation the difference between illiterate not mentally retarded patients and literate not mentally retarded patients is more pronounced. This is shown in Table IV.28. Among the illiterate, those free of institutionalism are 30.6%, those "borderline" 11.1%, and those institutionalised 58.3%. In contrast among the literate not mentally

Table IV.28

Institutionalism and Illiteracy for Not Mentally Retarded Patients

	Illiterate	Literate	All
Normal	11 (30.6%)	76 (49%)	87 (45.5%)
"Borderline"	4 (11.1%)	45 (29%)	49 (25.7%)
Withdrawn	21 (58.3%)	34 (21.9%)	55 (28.8%)
	36 (100%)	155 (100%)	191 (100%)

The difference in institutionalism between literate and illiterate patients is very highly significant ($\chi^2 = 19.28$, $df = 2$, $p = 0.0001$, $C = 0.30285$)

retarded the patients free of institutionalism are 49%, those classified as borderline are 29% and the institutionalised are only 21.9%. The difference is very highly significant $\chi^2 = 19.28$ with 2 degrees of freedom, $p = 0.0001$, the contingency coefficient is $C = 0.30285$. In conclusion illiteracy is a variable associated with institutionalism among the studied population. Before generalising, however, to all patients a number of possible explanations must be mentioned. For example, (a) Illiterate people tend to be kept in the hospital longer than the literate patients thus being subjected to the effects of a

custodial institution for longer period, and (b) Another factor may be that illiterates are handled differently by the hospital staff. Further research is needed in order to clarify the reasons why these two variables (illiteracy on admission and institutionalism) are associated.

d. Institutionalism and occupation before admission.

Table IV.29 shows the percentage of institutionalised patients among those who were never employed or were working in unskilled jobs.

Table IV.29
Institutionalism and Usual Occupation

	Never employed, unskilled	Semiskilled or higher	All
Normal	84 (38.2%)	18 (48.6%)	102 (39.7%)
"Borderline"	46 (20.9%)	9 (24.3%)	55 (21.4%)
Withdrawn	90 (40.9%)	10 (27%)	100 (38.9%)
	220 (100%)	37 (100%)	257 (100%)

The difference in institutionalism between the two occupational groups is not significant ($\chi^2 = 2.61$)

About 40.9% of the patients in this occupational category are institutionalised. Among the patients who were working before admission in semiskilled or higher jobs the percentage of patients with institutionalism is lower i.e. 27%. The difference is not statistically significant. The figures of Table IV.29 also indicate how much the population studied was skewed towards the unskilled and the unemployed. The data of this research do not allow any general conclusions on the question of occupation and institutionalism.

e. Institutionalism and father's occupation.

There were only a small number of charts where the occupation

of the father was recorded. Table IV.30 shows that only in 48 patients there was any information in this respect. These 48 patients were grouped into those whose fathers were unskilled in their usual occupation or never employed and those whose fathers were in the semi-skilled or higher occupations. There were 31 institutionalised patients

Table IV.30
Institutionalism and Father's Occupation

	Never employed, unskilled	Semiskilled or higher	Total
Normal	11 (35.5%)	9 (53%)	20 (41.6%)
"Borderline"	9 (29%)	3 (17.6%)	12 (25%)
Withdrawn	11 (35.5%)	5 (29.4%)	16 (33.4%)
	31 (100%)	17 (100%)	48 (100%)

The difference in institutionalism between patients with fathers of lower and higher occupational status was not significant
($\chi^2 = 1.42$)

among the former (35.5%) and 17 among the latter (29.4%). The difference was not significant. As this poverty of information in the hospital records was noted during the exploratory phase and before the design of the research, a question was included in the item sheet addressed to the patient, during the short interview. Table IV.31 shows the replies of the patients. 254 patients replied clearly to the question. The remaining 70 patients were incapable (in the majority) or unwilling (in the minority) to reply. 29% of the patients who had an unskilled or never employed father were institutionalised. 23.6% of the patients who had a father with semi-skilled or higher job were institutionalised. The difference between the two groups is

not significant. In conclusion no association was demonstrated between father's occupation and degree of institutionalism of the patient.

Table IV.31

Institutionalism and Father's Occupation

(as reported by the patient)

Withdrawn	Never employed, unskilled	Semiskilled or higher	Total
Normal	78 (46.2%)	42 (49.4%)	120 (47.2%)
"Borderline"	42 (24.8%)	23 (27%)	65 (25.5%)
Withdrawn	49 (29%)	20 (23.6%)	69 (27.2%)
	169 (100%)	85 (100%)	254 (100%)

The difference in institutionalism between patients who reported a lower and a higher occupational status of their father was not significant ($\chi^2 = 0.87$)

f. Vision on admission and institutionalism.

In only four records was there an indication that the vision of the patient was moderately or seriously affected. This may be an underestimate. The examination of vision requires careful observation and the cooperation of the patient. As the physical examinations of admitted patients are done on admission, or soon after it, it is possible that some of these physical examinations were done under difficult conditions with uncooperative patients and perhaps in a perfunctory manner. Table IV.32 shows that of the four affected in their vision 3 patients were withdrawn while 1 was normal as far as institutionalism is concerned. These numbers when converted into percentages show differences from the rest of the patients but the differences are not significant.

Table IV.32
Vision on Admission and Institutionalism

	Vision		Total
	Normal	Affected	
Normal	124 (38.9%)	1 (25%)	125 (38.7%)
"Borderline"	78 (24.5%)	0 (0%)	78 (24.1%)
Withdrawn	117 (36.7%)	3 (75%)	120 (37.2%)
	319 (100%)	4 (100%)	323 (100%)

The difference in institutionalism between those with normal and those with affected vision was not significant ($\chi^2 = 1.77$)

During the interview with the patient an estimate of moderate and severe visual disturbances was made. 19 patients were found to be affected. Table IV.33 shows the results. Out of these 19 patients 13 (68.4%) showed institutionalism while for the remaining patients the percentage of patients with institutionalism was 34.2%) This

Table IV.33
Vision During the Interview and Institutionalism

	Vision		Total
	Normal	Affected	
Normal	121 (40.6%)	3 (15.8%)	124 (39.1%)
"Borderline"	75 (25.2%)	3 (15.8%)	78 (24.6%)
Socially withdrawn	102 (34.2%)	13 (68.4%)	115 (36.3%)
	298 (100%)	19 (100%)	317 (100%)

The difference in institutionalism between those affected in vision and those not affected is significant ($\chi^2 = 9.19$, p less than 0.02)

difference is statistically significant ($\chi^2 = 9.19$ p less than 0.02).

This difference must be interpreted with caution as the number of patients found to have moderate or severe visual disability is almost 4 times the number recorded on admission. It is likely that a number of patients with such disabilities was missed and even more likely that a number of these patients developed their disabilities later. The most common visual disabilities (such as those due to cataract or glaucoma) are disabilities occurring in old age rather than in youth. The association between visual disability at present and institutionalism in these patients does not necessarily mean that visual disability predisposes to institutionalism. The real association may be between institutionalism and length of stay in the hospital. This latter association was found by previous investigators (Wing and Brown, 1970, p. 199) and "length of stay" and "social withdrawal" had a correlation of 0.302 in their study. In the same study the investigators found a correlation between age and length of stay equal to 0.447. A correlation between length of stay and age is not surprising in long stay psychiatric patients. In conclusion no association is demonstrated between visual disability as a premorbid factor and institutionalism.

g. Hearing on admission and institutionalism.

Table IV.34 shows that the patients with affected hearing on admission develop institutionalism in 60% of the cases while for the remaining of the patients the percentage of those with institutionalism is 35.4%. The difference is statistically significant ($\chi^2 = 8.3$, $p = 0.0157$). The contingency coefficient is $C: 0.15860$. It appears that there is an association between a hearing disability on admission and the development of institutionalism after a long hospital stay.

Table IV.34

Institutionalism and Hearing on Admission

	Hearing on Admission		Total
	Normal	Affected	
Normal	116 (39.1%)	9 (36%)	125 (38.8%)
"Borderline"	76 (25.6%)	1 (4%)	77 (23.9%)
Withdrawn	105 (35.4%)	15 (60%)	120 (37.3%)
	297 (100%)	25 (100%)	322 (100%)

The difference between institutionalism and patient affected in their hearing and normal is significant ($\chi^2 = 8$. $p = 0.0157$, Contingency coefficient = 0.15860)

When the number of patients who have a hearing disability during the survey is measured one finds 37 cases. However, the association between present hearing disability and institutionalism is not significant. It is only when the severely affected cases are considered against the remaining cases that an association between hearing disability and institutionalism is ascertained. This is shown in Table IV.35: out of the 20 cases of severely affected in their hearing patients 65% are

Table IV.35

Severe Hearing Disability During the Survey and Institutionalism

	Hearing normal or moderately affected	Hearing severely affected	Total
Normal	119 (40%)	5 (25%)	124 (39.1%)
"Borderline"	76 (25.6%)	2 (10%)	78 (24.6%)
Withdrawn	102 (34.4%)	13 (65%)	115 (36.3%)
	297 (100%)	20 (100%)	317 (100%)

The difference in institutionalism between patients with severe hearing disability and those normal or with moderately diminished hearing is significant ($\chi^2 = 8.0$, p less than 0.02)

withdrawn while in the remaining patients the percentage of withdrawn patients is 34.4%. The significance of the difference is at the level of p less than 0.02. Because decrease of hearing is a slowly progressing disability it is possible that those affected severely now were also affected on admission or at least for several years and, therefore, decrease of hearing is a disability contributing to institutionalism or even predisposing to it. However, caution must be exercised here because this disability was not measured by exact audiometric methods but by a gross "clinical" estimate and thus the distinction between "moderately affected" and "severely affected" is not as clear as the distinction between "normal in hearing" and "diminished hearing".

Another possibility would be to examine the patients who are deaf mutes. There are three deaf mutes among the 324 patients, two of them are free from institutionalism and the other is classified as "borderline" in institutionalism. The numbers are too small to allow any conclusions. Only hypotheses can be formulated. One such hypothesis would be that deaf mutes develop methods of nonverbal communication through gestures, etc. which are equivalent to speech. In contrast other patients who lost their hearing later in life may be incapable of developing the same successful communication. Another possibility is that deaf mutes with relatively milder psychiatric conditions tend to stay in settings of residential care, because of their disability and the occupational, educational and other consequences of it. The patients in this research are all in boarding care, they are 54, 68 and 37 years old. They have long hospitalisations mostly due to behavior problems. At any rate the number of deaf mutes in this study is too

small to allow any conclusions.

h. Speech on admission and institutionalism. Table IV.36 shows the patients who, according to their hospital records had a moderate or severe speech disability (e.g. due to dysarthria) on admission.

Table IV.36

Speech on First Admission and Institutionalism

	Speech		Total
	Normal	Affected	
Normal	117 (40.9%)	6 (17.1%)	123 (38.3%)
"Borderline"	74 (25.9%)	4 (11.4%)	78 (24.3%)
Withdrawn	95 (33.2%)	25 (71.4%)	120 (37.4%)
	286 (100%)	35 (100%)	321 (100%)

The difference in institutionalism between those with affected speech and those normal is significant ($\chi^2 = 19.45$, $p = 0.0001$, Contingency coefficient: $C = 0.2390$)

There were 35 such patients. 25 among them (71.4%) showed institutionalism while among the remaining 286 patients who were not disabled in this respect only 95 (33.2%) were found to have institutionalism. The difference is very highly significant ($\chi^2 = 19.45$, $p = 0.0001$). The contingency coefficient is 0.2390.

The above finding may be challenged by the objection that on first admission or soon after first admission the doctors and the nurses were unable to distinguish between a patient with an organic speech disability and a patient unwilling to speak or mute due to a severe "functional" psychosis, e.g. catatonic schizophrenia. An attempt was made to exclude such cases by consulting the notes of doctors and nurses in subsequent hospitalisations, but it is still

possible that a small (perhaps very small) number was misclassified in this respect. During the interview with the patient the capacity of the patient to speak was evaluated and when in doubt the landlady or the nurse in charge of the patient was questioned about the best speech of the patient when in company with familiar persons and when in his best mental health. Table IV.37 shows the findings.

Table IV.37

Speech Disability During the Interview and Institutionalism

	Speech		Total
	Normal	Affected	
Normal	111 (42%)	13 (23.6%)	124 (38.9%)
"Borderline"	70 (26.5%)	8 (14.6%)	78 (24.5%)
Withdrawn	83 (31.5%)	34 (61.8%)	117 (36.6%)
	264 (100%)	55 (100%)	319 (100%)

The difference in institutionalism between those with affected and those with normal speech is significant ($\chi^2 = 18.13$, p less than 0.001, $C = 0.231899$)

There were 55 patients with moderately or severely affected speech. The number of patients with institutionalism among those affected was 34 (61.8%) while among the remaining 264 patients those with institutionalism were 83 (31.5%). The difference is highly significant ($\chi^2 = 18.13$, p less than 0.001). The contingency coefficient is $C = 0.231899$.

1. Locomotion and institutionalism. Table IV.38 shows the number of patients recorded as disabled in locomotion on admission. There were 16 cases. 12 of them (75%) showed institutionalism while among the remaining patients 108 out of 306 (35.3%) showed institutionalism.

The difference is statistically significant ($\chi^2 = 10.37$, $p = 0.0056$, $C = 0.17668$). When the patients who are during the interview disabled in locomotion are examined the degree of institutionalism among them is again much more pronounced than the degree of institutionalism of the remaining patients. The difference is very highly significant.

Table IV.38

Institutionalism and Locomotion on First Admission

	Locomotion		Total
	Normal	Affected	
Normal	122 (39.9%)	3 (18.8%)	125 (38.8%)
"Borderline"	76 (24.8%)	1 (6.3%)	77 (23.9%)
Withdrawn	108 (35.3%)	12 (75%)	120 (37.3%)
	306 (100%)	16 (100%)	322 (100%)

The difference between those affected and those normal in locomotion is significant ($\chi^2 = 10.37$, $p = 0.0056$, Contingency coefficient $C = 0.17668$)

j. Manual ability on admission and institutionalism.

Table IV.39 shows a related disability, that of manual ability.

Table IV.39

Institutionalism and Manual Ability on Admission

	Manual Ability		Total
	Normal	Affected	
Normal	124 (40.3%)	1 (7.7%)	125 (38.9%)
"Borderline"	76 (24.7%)	1 (7.7%)	77 (24%)
Withdrawn	108 (35.1%)	11 (84.6%)	119 (37.1%)
	308 (100%)	13 (100%)	321 (100%)

The difference in institutionalism between those affected and those normal in manual ability is significant ($\chi^2 = 13.15$, $p = 0.0014$, Contingency coefficient $C = 0.19844$)

13 patients were disabled in this respect on admission according to the hospital records. 11 of them (85.6%) were found to have institutionalism. In contrast among the remaining patients only 108 out of 308 (35.1%) showed institutionalism. The difference is significant ($\chi^2 = 13.15$, $p = 0.014$, $C = 0.19844$). When the manual ability of the patients during the interview is considered, 20 patients are found to be disabled. The degree of institutionalism among these 20 patients is more pronounced again than among the remaining patients. The difference is again significant (p less than 0.01).

Although locomotor ability may be considered as a factor limiting social interaction, manual ability affects social interaction only indirectly. That is, manual disability may affect the chances for occupational achievement (whether in unskilled or higher jobs) or perhaps produce feelings of inferiority in the patients affected. There is, however, another possible explanation (or an additional, perhaps more relevant, contributory, factor): the possibility that these motor disabilities are associated with some third condition such as mental retardation or severe chronic organic psychosyndrome, originating early in life. Such a condition would then in itself be associated with institutionalism.

This possibility can be tested by examining separately the mentally retarded and those without this diagnosis. Table IV.40 shows one of these motor disabilities, speech. There are 27 cases with affected speech among the 80 patients with diagnosis of mental retardation. There were 35 patients with speech disability on admission. Therefore, 77.1% of all patients with affected speech have the diagnosis of mental retardation, while only 18.6% of the patients who have normal

speech have the same diagnosis. The association between mental retardation and speech disability is highly significant $\chi^2 = 53.6$, p less than 0.0005. One must, therefore, examine the association between speech disability and social withdrawal first with the mentally retarded only. Table IV.41 shows that 77.8% of the mentally retarded with speech disability show institutionalism while only 41.5% of the

and could be due to Speech on Admission by Diagnosis

	Normal speech	Affected Speech	Total
Mentally retarded	53 (18.6%)	27 (77.1%)	80 (25%)
Other diagnoses	231 (81.4%)	8 (22.9%)	239 (75%)
	284 (100%)	35 (100%)	319 (100%)

Association between speech disability on admission and diagnosis of mental retardation is highly significant ($\chi^2 = 53.6$, p less than 0.0005)

Table IV.41

Speech on Admission of Mentally Retarded and Institutionalism

	Normal Speech	Affected Speech	Total
Normal	20 (37.7%)	4 (14.8%)	24 (30%)
"Borderline"	11 (20.8%)	2 (7.4%)	13 (16.3%)
Withdrawn	22 (41.5%)	21 (77.8%)	43 (53.8%)
	53 (100%)	27 (100%)	80 (100%)

The difference in institutionalism between those mental retardates with affected speech and those mental retardates with normal speech is significant ($\chi^2 = 9.47$, $p = 0.0088$, $C = 0.32536$.)

mentally retarded without such disability show institutionalism. The difference is significant ($\chi^2 = 9.47$, $p = 0.0088$, $C = 0.32536$). For those with another diagnosis the ones who have a speech disability are only 8 patients (see Table IV.42). Among those 4 showed institutionalism (50%) while among the patients with other than mental retardation diagnosis and no speech disability 72 among 231 (31.2%) showed institutionalism. The difference does not reach statistical significance and could be due to chance.

Table IV.42

Speech on Admission for Other Diagnoses and Institutionalism

	Normal Speech	Affected Speech	Total
Normal	97 (42%)	2 (25%)	99 (41.4%)
"Borderline"	62 (26.8%)	2 (25%)	64 (26.8%)
Withdrawn	72 (31.2%)	4 (50%)	76 (31.8%)
	231 (100%)	8 (100%)	239 (100%)

The difference in institutionalism between those not mentally retarded patients who are affected in speech and those who are normal does not reach significance ($\chi^2 = 1.41$)

In conclusion among the motor disabilities the one which was tested (speech) was found associated with the diagnosis of mental retardation. However, within the group of mentally retarded there was still an association between speech disability and institutionalism. In the remaining patients there was a trend towards a higher incidence of institutionalism with speech disability but the number of cases was very small and the difference could be due to chance.

k. Marital state and institutionalism. Concerning the marital state the patients were regrouped into the celibate and the "ever married". The reason of such a grouping was that married, divorced, separated and cohabiting have the common feature of the capacity (at least once in their life) of forming an intimate interpersonal relationship. Table IV.43 shows that among the celibate the percentage

Table IV.43
Institutionalism and Marital State

	Marital State		Total
	Celibate	Others (ever married)	
Normal	100 (37.6%)	25 (43.1%)	125 (38.6%)
"Borderline"	59 (22.2%)	19 (32.8%)	78 (24.1%)
Withdrawn	107 (40.2%)	14 (24.1%)	121 (37.3%)
	266 (100%)	58 (100%)	324 (100%)

The difference in institutionalism between the celibate and the "ever married" approaches significance ($\chi^2 = 5.88$, $p = 0.0527$, Contingency coefficient $C = 0.1336$)

of institutionalised patients was higher (40.2%) than among those ever married (24.1%). The difference does not reach the predetermined criterion of at least significance at the 0.05 level although it approaches it ($\chi^2 = 5.88$, $p = 0.0527$). The trend is clearly there. Single patients may still be more vulnerable to institutionalism but if it is so, such an association is masked in the data of this research by other variables or by a selective process. It is for example possible that institutionalised single patients are accepted better by their parental families, than institutionalised married patients because the parental family may accept more easily a nontroublesome, quiet patient who needs care. In contrast, the family of a married man, for example, expects him to earn a living

and, therefore, would tend to let him in the hospital if institutionalised. This interpretation would need further research and it is outside the scope of this study.

I. Conclusion.

Of the eleven premorbid factors hypothesised to be associated with institutionalism the findings of this research showed that in this population six were associated with institutionalism: intelligence, education, decreased hearing, impaired speech, locomotion disability and manual disability. For the remaining five factors, i.e. age, occupation, father's occupation, decreased vision and marital state there was no sufficient proof of association. One of these five factors, however, namely celibacy, showed a clear (but not statistically proven) tendency towards association.

CHAPTER V: DISCUSSION

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CHAPTER V: DISCUSSION

CHAPTER V: DISCUSSIONA. The composition of the two groups of patients1. Summary of the findingsa. The patients in the boarding homes.

The 274 boarded patients were found to be less institutionalised than their counterparts who live in the hospital. The predominant diagnosis was schizophrenia which applied to 159 patients (58% of the total boarded patients). The mean number of patients per boarding home was 25. The mean age of boarded patients was 53.7 years. The hypothetical average patient (a fictional patient constructed on the basis of mean values) was admitted in the mental hospital 3.7 times, stayed there for a cumulative duration of 11 years and 10 months and has spent in boarding care another 5 years and 7 months.

b. The patients in the hospital wards.

The sample of 50 random patients, selected among the long stay patients with the criterion of at least two years of continuous hospital stay prior to the survey, constituted a different population. The predominant diagnosis was mental retardation: half of the patients had this diagnosis. The difference in diagnoses between boarded and ward patients was highly significant. The mean number of patients per ward was 34.8. The wards, therefore, are larger than the homes ($t = 5.33$). The hypothetical average patient in the hospital group was 42 years old, considerably younger than the boarded patient ($t = 4.99$). The ward patient was admitted on the average 2 times and stayed in the hospital for a cumulative period of 16 years and 5 months ($t = 2.89$), but has spent only 8 months in the homes. This short

boarding care duration is of course expected because of the criteria for sampling. It means simply that a few of the ward patients were tried, unsuccessfully, in the past in boarding care for a short period.

In conclusion, both groups are composed of patients who are educationally, intellectually, occupationally and socially underprivileged. They are very long stay patients and they suffer predominantly from schizophrenia and mental retardation.

2. Phases in the long process of a patient's psychiatric care

The composition of the population of boarded and hospital patients can be explained as the result of the influence of many factors. Most long and chronic psychiatric illnesses start and progress slowly. There is a stage during which the patient and his family are not aware of the presence or the effects of the illness. During such a stage the educational, occupational and social achievements (the latter in the form of acquaintances and relationships) are profoundly affected. By the time the family of the patient himself realises the presence of the illness, there is often already an established inferiority of the patient in comparison with the same aged individuals in the community. At this point a selective factor operates. Patients with relatively higher socioeconomic status will seek a private medical practitioner, or will be taken by their families to him or to a hospital of high prestige away from the locality where they reside. This is usually done in order to secure the best care but also to avoid gossip in the community. At the present time the presence of well organised and prepaid medical schemes as well as the gradual reduction of the popular stigma associated with psychiatric illness may have

changed the course of events. The patients studied in this research, however, had the onset of their illness about a generation ago. The socioeconomic status of the patient's family was still at that time influential in determining the type of psychiatric care. It is reasonable to assume that this brought about a composition of patient population which was already leaning, on admission time, towards the socioeconomically underprivileged patient. This selection factor continued to operate at all stages of the long course of the patient's illness. If patients from higher socioeconomic strata were at all admitted, they had a higher chance to be discharged to the community, to be retained by the family at the time of recurrence of symptoms, and, if the family proved unable to retain them, to be taken to privately financed boarding care, unsupervised by the hospital. This selective influence of socioeconomic status on the chance for admission and discharge is one of the possible factors explaining the striking skewing of the populations of boarded and ward patients towards the uneducated, unskilled and especially explaining the fact that a skewing towards the unskilled occupations was observed even in the fathers of the patients.

3. The ongoing selection process

Perhaps the single most important factor acting selectively to determine the composition of the groups is the severity of the clinical condition of the patient. To this complex variable of the severity of the patient's condition many factors contribute, one important among them being diagnosis. In the previous chapter it was demonstrated that the most common diagnoses were those of schizophrenia and mental retardation. Other common diagnoses were chronic organic

psychosyndrome (26 cases) and affective psychosis (24 cases). In contrast the diagnosis of neurosis was made in only 5 cases (1.6% of the total) and the diagnosis of personality disorder in 4 only cases (1.4%). Specific disabilities and physical illness aggravate the severity of the patient's condition. It is not surprising that more than one third of the patients were physically ill (120 cases). The additional care, that a psychiatric patient, who is also physically ill, requires, may well be the cause or the reason for prolonged residential care, whether in the hospital or the boarding homes. An example is the diabetic patient who needs drugs for his physical illness and a special diet.

However, the clinical variables alone cannot explain the composition of the two groups because many patients were not severely ill or disabled, at the time of the survey. One must conclude that there were additional factors operating. There is, for example, a considerable number of cases in the boarding homes who appear and behave like normal individuals for all practical purposes. An example is the following:

Case #229, L.M.

Mr. M. is a 67 year old man, single, who became suddenly ill 40 years ago from what was diagnosed and confirmed later as manic depressive psychosis, circular type. He was hospitalised 5 times and one of these hospitalisations lasted 8 years and 7 months. He has spent a cumulative stay of 12 years and 7 months in the hospital. Following his last hospitalisation he was discharged to a boarding home. Since that time he has spent 14 years and 9 months (until the time of the interview) in boarding care.

During the interview he was spontaneous, talkative, humorous, showed personal interest in the researcher asking him questions and appeared free of any symptoms. He said he liked the mental hospital because of the opportunities of occupational therapy there. The opinion of the landlady is that "he is completely normal as far as I am concerned". On questioning, the landlady described him as active, clean, tidy, talkative and pleasant. He visits home.

Even if this patient has a potential of showing depressive episodes in the future or has some minor symptoms and complaints which did not surface during the interview and were never noted by the landlady, it is difficult to conclude that there are any medical reasons for keeping him in a residential programme of care for psychiatric patients. The reasons for such a care are probably strictly social. The retention of patients in hospitals because of social reasons is not unusual. The consensus of opinion regarding the long stay of patients in mental hospitals exposed during the "Skitch Symposium for Mental Health Care Delivery" (e.g. Murphy, 1974) was that the long stay patients in mental hospitals are there because of social reasons. The history of mental institutions shows that they were founded in the first place in most countries (Norway is an exception) for social reasons (Murphy, 1974).

The two populations studied show an overrepresentation of the socioeconomically deprived, the uneducated, those with low socioeconomic status, the single and never married and the Roman Catholic. These social variables seem to determine for some patients whether they stay for long periods in residential care, without necessarily leading, as it is explained later, to institutionalism.

The two groups of patients also differ one from another. The selection of who goes to boarding care and who stays in the hospital is made by psychiatrists and their coworkers. An important criterion is the results of the assessment of predicted degree of adjustment of a patient in boarding care. It is of interest to see the differences of the two residential groups. In the hospital the clinical state of the patients shows generally more psychiatric symptoms more institutionalism, less education. The prevalent diagnosis is mental retardation. The age is younger. It appears, therefore, that the young severely mentally retarded individual is not a good candidate for this particular boarding care programme. In contrast the older patient who had schizophrenia, or manic depressive psychosis seems to adjust well in the boarding homes.

The typical patient in this boarding care programme is not very different from the "average foster home patient" described by the group of Montreal researchers who have done the most extensive study of boarding homes (or foster homes), (Murphy et al., 1974). According to these investigators the typical patient is "a residual schizophrenic who has been in and out of hospital for over ten years, has been two years or more in hospital in his last stay, and has virtually ceased to show any further response to therapy."

B. Institutionalism

1. Prevalence of institutionalism

The survey of patients in the boarding homes showed that 29% showed institutionalism according to the criterion of "social withdrawal" adopted in this research. Another 25.5% were classified as "borderline" in social withdrawal. In the hospital

wards the "institutionalised" patients (i.e. those with institutionalism) represent 80% and another 16% are "borderline". This very highly significant difference (see Table IV.2, p. 85) is expected because the two residential settings house two entirely different populations (different in age, diagnosis, severity of illness and some other variables). What is striking is the high percentage of institutionalism among the patients in the boarding homes. Boarding homes (foster homes) were originally proposed as a method of prevention or treatment of institutionalism (Chien and Cole, 1973; Crutcher 1974; Morissey, 1967; Engelsman et al., 1974). The extensive study of Murphy and his associates (Murphy et al, 1974) as mentioned earlier concluded that "improvement in social skills" was "relatively rare" in foster homes. The findings in this research confirm this conclusion.

2. Institutionalism and diagnosis

Although most of the original observations on institutionalism (e.g. Barton, 1955; Ellenberger, 1960; Miller, 1961) were based on the observation of mental patients regardless of diagnosis, research studies tended to be confined to schizophrenics or psychotics (Wing and Brown, 1970; Pasamanick et al., 1968; Davis et al., 1974). It is, therefore, worthy of noticing the fact that in this population the patients with the diagnosis of mental retardation show a higher percentage of institutionalism (53%) than those with the diagnosis of schizophrenia (33%) or with other diagnoses (28%). This was shown previously in Table IV.1, p. 83). It would be of course unwise to assume that mental retardation predisposes more to institutionalism, because it is quite possible that only very severe forms of mental retardation become part of the population of long stay psychiatric patients or that other factors (such as differential

care from the hospital staff) operate.

3. Premorbid factors and institutionalism

According to the original hypothesis certain premorbid characteristics of the patients were expected to be associated with institutionalism. The findings of this project confirmed some of the associations between premorbid factors and institutionalism. Intelligence is associated with institutionalism, even if we exclude mentally retarded patients and confine observations to patients with normal intelligence. Education and illiteracy are also associated. Disabilities in speech, hearing, locomotion and manual dexterity are all associated. In contrast certain social variables such as celibacy, extremes of age, occupation of the patient and occupation of his father did not appear to be associated with institutionalism to a statistically significant degree.

All the premorbid factors which were associated with institutionalism in the present study have in common that they affect the individual's capacity to communicate. Exceptions are perhaps locomotion and manual ability which by themselves are not handicaps in communication itself but may deprive an individual of opportunities to communicate.

Another possible factor related to intelligence, education, speech and hearing ability, good locomotion and manual dexterity is the amount of activity of the patient during his long stay in the hospital or boarding home. Activity and communication are again probably inter-related.

It is also possible that these motor disabilities are correlated with speech disability, as a considerable number of patients suffer from chronic organic psychosyndromes or severe mental retardation.

On the other side the premorbid factors which constitute a social inferiority, such as having never been married, low occupational status, low occupation in the father and extremes of age do not affect communication. Furthermore, in the rural and fishing communities from which most of these patients came, these occupational and social inferiorities might not even stand out as an inferiority at all, because of the homogeneity of these small communities.

It is of interest to examine not only the presence of associations between the premorbid factors and institutionalism but also the strength of these associations. As the data are measured in a nominal scale and the associations are tested by chi square only, the appropriate measure is C, the contingency coefficient (Siegel, 1956, p. 196). In order of increasing size of the contingency coefficient the associations between premorbid factor and institutionalism are (a) hearing = 0.15860, (b) locomotion = 0.17668, (c) manual ability = 0.198444, (d) intelligence = 0.22538, (e) speech = 0.2390, (e) education = 0.2847, and (g) illiteracy = 0.33728. The higher contingency coefficients of intelligence, speech, education and literacy appear to show that institutionalism is statistically associated with the patient's ability to communicate with others. It is easy to conceive the importance of education and literacy for the patients in residential care, especially in the mental hospital. Communication with relatives living far away in some parts of the province of Newfoundland was sometimes possible only through letters due to distances involved. The capacity to read books or newspapers, the possession of wide interests and the ability to understand and follow television programs and radio broadcasts may be a very important way of keeping contact with the world outside the

hospital. Intelligence of at least the average level, literacy and education beyond the mere capacity to read and write are necessary for this contact with the outside world.

4. Institutionalism and some variables related to communication and activity.

At this point it is useful to examine the association of institutionalism with some related variables. If the above interpretations are to have some weight then institutionalism ought to be highly correlated with "interests during leisure time", "information about current events" and "contact with the outside world".

As it was already discussed one of the partial measures of institutionalism is variable 97 in the item sheet which measures leisure interests. In the previous chapter it was pointed out that the correlation between the overall measure of "social withdrawal" and the partial scores varies from 0.11503 (Kendall's tau) for "behavior at meal times" to 0.61760 for "personal appearance". "Leisure interests" correlates with social withdrawal with a value only next to "personal appearance", i.e. 0.54498. It appears, therefore, that the interests of the patient during his leisure time are clearly correlated with institutionalism. This measure includes also reading, watching television and some activities which necessitate mixing with others, (see Table IV.22, p. 105).

Regarding the relationship of information about current events and institutionalism Table V.1 shows that the percentage of patients with institutionalism among the well informed about current events is only 17.3% while among those patients who are somewhat informed about current events is essentially the same, i.e. 16.2%. When, however,

Table V.1
Institutionalism and General Information

	Informed	With some information	Uninformed	Total
Normal	42 (51.8%)	55 (55.5%)	27 (24.6%)	124 (42.7%)
"Borderline"	25 (30.9%)	28 (28.3%)	24 (21.8%)	77 (26.6%)
Withdrawn	14 (17.3%)	16 (16.2%)	59 (53.6%)	89 (30.7%)
	81 (100%)	99 (100%)	110 (100%)	290 (100%)

The association between "lack" or "some" information and institutionalism is significant $\chi^2 = 46.1$, $df = 4$, p less than 0.001, Kendall's tau = 0.28020

one examines the patients who are completely uninformed about the current events the percentage of institutionalised patients increases to 53.6%. The differences are highly significant ($\chi^2 = 46.1$ with 4 df , p less than 0.001). There is also a rank correlation (Kendall's tau = 0.28020). It appears, therefore, that lack of information about current events is associated with institutionalism. Information is naturally associated with literacy. Table V.2 shows that 7% of those patients who are well informed are illiterate while among those with partial or good information about current events the illiterate represent a much higher percentage (39.8%). The difference is highly

Table V.2
Information and literacy

	Informed	Uninformed or partially informed	Total
Illiterate	5 (7%)	64 (39.8%)	69 (29.7%)
Literate	66 (93%)	97 (60.2%)	163 (70.3%)
	71 (100%)	161 (100%)	232 (100%)

The association between information and literacy is significant $\chi^2 = 23.68$, p less than 0.001, $C = 0.304367$

significant ($\chi^2 = 23.68$, p less than 0.001, the contingency coefficient 0.304367). Analogous results are obtained by comparing education to information ($\chi^2 = 21.42$, p less than 0.001, $C = 0.2788$, see Table V.3).

Table V.3
Information and Education

	Informed	Uninformed or partially informed	Total
Education none or less than 3 years	7 (9.5%)	72 (40%)	79 (31.1%)
Educated for 3 or more years	67 (100%)	108 (60%)	175 (68.9%)
	74 (100%)	180 (100%)	254 (100%)

Association between education and "information"
highly significant ($\chi^2 = 21.42$, $df = 1$, p less
than 0.0001, $C = 0.278893$)

A lack of contact with the outside world was observed to be correlated with social withdrawal by Wing and Brown (1970) with an $r = 0.481$. In the present research the measure of contact with the outside world adopted was that of Wing and Brown. Table IV.10, p. 93 showed that almost half of the patients (47.5%) had no contact with the outside world (by visiting home or by being visited in their present residence). Table V.4 shows the association between contact with the outside world and absence of institutionalism. While among those who had good contact with the outside world only 22% were found to show institutionalism, the corresponding percentage among the patients with no contact whatsoever was 45.5%. These differences are significant at the level of 0.01.

Table V.4

Contact with the Outside World and Institutionalism

	Good contact (Score 6-15)	Occasionally visited (Score 4)	None (Score 3)	Total
Normal	44 (53.6%)	30 (34.1%)	51 (33.1%)	125 (38.6%)
"Border- line"	20 (24.4%)	25 (28.4%)	33 (21.4%)	78 (24.1%)
Withdrawn	18 (22%)	33 (37.5%)	70 (45.5%)	121 (37.3%)
	82 (100%)	88 (100%)	254 (100%)	324 (100%)

The association between lack of contact and institutionalism is significant: $\chi^2 = 15.69$, $df = 4$, p less than 0.01

It is still remarkable that there were 18 patients who were socially withdrawn and still had "good contact" with the outside world, in the sense of having at least regular visits. Even if we exclude the patients visited regularly but never going to their homes, there are 10 patients who show institutionalism. These 10 patients had a score in "contact with the outside world" of 9 or higher. As these 10 cases are atypical it would be of interest to see in what respect they differ from the rest of the patients. For this reason these 10 cases were compared to the remaining 314 cases, as to all variables measured in this research. Table V.5 shows in which variables these atypical cases differed from the remaining patients: they tended to have more often, at the time of the survey (but not on first admission), decreased hearing, they presented delusions evident during the short interview, they gave reason to their landladies to complain about their "troublesome behavior" (a measure adopted from Gruenberg's measures for "social breakdown syndrome", Gruenberg, 1966) and they were threatening

Table V.5

Difference of the atypical patients (those having "very good contact" with the outside world and still being socially withdrawn) from the remaining patients

VARIABLE	Socially withdrawn with very good contact"	Remaining patients	χ^2	df	p less than:
Hearing moderately or severely affected	4 (40%)	33 (10.7%)	5.48	1	0.02
Delusions evident	2 (25%)	5 (1.7%)	8.72	1	0.01
"Troublesome behavior"	3 (30%)	27 (8.6%)	6.08	2	0.05
Threatening in manner	2 (20%)	6 (1.9%)	13.27	2	0.002

in manner but not in action. In conclusion these patients who show institutionalism despite their good contact with the outside world are (a) deaf or nearly deaf patients or (b) patients with what is sometimes called "florid" symptomatology (delusions and threatening behavior). One could support that these patients were prevented from "real" contact, despite the "physical" contact with their relatives or friends, because of barriers in communication due to hearing disability or delusions. Their troublesome or threatening manners could well be the outcome of delusions. These atypical cases appear to illustrate the importance of lack of communication as a factor for institutionalism.

The associations between some motor disabilities, such as locomotion disability and manual disability, with institutionalism may be due: (a) to a possible association between such disorders and severe

or profound mental deficiency or chronic organic psychosyndromes, and (b) another factor already mentioned may be the association of such disabilities with idleness i.e. absence of any occupation during the stay in the hospital or a boarding home. Wing and Brown (1970) had examined again the intercorrelations between social withdrawal and this form of idleness. They found that social withdrawal correlated with degree of occupation ($r = -0.468$) and with "time doing nothing" ($r = 0.634$). The higher correlation of social withdrawal with the measure "time doing nothing" is easy to explain, because the latter takes into consideration not only occupation but also those patient's activities which are not occupational but recreational. In this project the association of present amount of occupation (variable 106, see Appendix A, item 106 utilising the same scale as Wing and Brown did) with institutionalism very highly significant ($\chi^2 = 142.35$, df 22, p less than 0.0001) and the rank correlation was: Kendall's tau 0.4124. In the data also of the present project there was an association between present occupation and manual motor ability. Table V.6 shows that among the 308 patients with normal manual ability 147 are occupied while among the 13 patients with affected normal ability only 2 are occupied. Figured out in percentages those occupied at present drop from 47.7% to 15.4% with the change from normal to disabled manual ability. The difference is significant at the 0.05 level ($\chi^2 = 4.02$, df 1, C = 0.1112).

ferences that remain are as follows: Table V.6

Manual Ability and Amount of Present Occupation

	Manual ability		Total
	Normal	Affected	
Not occupied at present	161 (52.3%)	11 (84.5%)	172 (53.6%)
Occupied at present	147 (47.7%)	2 (15.4%)	149 (46.4%)
	308 (100%)	13 (100%)	321 (100%)

The association between manual ability and present occupation is significant: $\chi^2 = 4.02$,
 p less than 0.05, C = 0.1112

5. Comparisons with the findings of other studies.

To the knowledge of this writer no other study has surveyed the degree of institutionalism of all diagnostic categories in both hospital and boarding home patients. The detailed, careful and crucial research of the British investigators from which most measures are taken for this research, was a study of schizophrenic women only, living exclusively in hospital wards (Wing and Brown, 1970). The present research was done at a time, when the treatment methods were relatively advanced in both community psychiatry and psychopharmacology. The utilisation of boarding homes makes the patients remaining in hospital quite a different population from what they would have been if all the residential care had been offered only in the hospital wards. The utilisation of the boarding homes, e.g. makes it possible for the predominant diagnosis of the hospital patients to be mental retardation. Other features of the population depend on the fact that the demographic composition of Newfoundland in general is different from that of the British population from which the patients of Wing and Brown were drawn. Despite these dif-

ferences there remain some similarities. None of the patients obtained the highest score on social withdrawal (i.e. 16) in this project as well as the research of Wing and Brown. "Occupation at present time" correlated highly with social withdrawal. Marital status and father's occupation were not correlated with social withdrawal in either of the two studies.

The study of the McGill group (Murphy et al., 1974, 1976; Engelsmann et al., 1974; Tchong - Laroche et al., 1976) was conducted in a very similar setting i.e. boarding homes in Canada but with different objectives. In the present research the objective was to survey long stay patients and examine the influence of premorbid factors. As it was pointed out earlier (p. 134) the typical patient appeared to be similar in the two studies of boarding homes.

6. Practical implications

What, if any, were the practical implications of the present research?

The finding of specific vulnerability in those patients who are deprived in intellectual resources, education or ability to communicate has some practical significance for the care of chronic and long stay patients. The nonintelligent, uneducated, those with decreased hearing and those with disability in speech and locomotion are also the least capable of asking and demanding their share of attention from the hospital staff and their share of care. As it is they are precisely the patients who need more of this extra attention and care in order to avoid a gradual social withdrawal. It appears, therefore, that a knowledge of the specific susceptibility of some patients to institutionalism is necessary in order to prevent institutionalism in these categories

chronic psychiatric patients clinical improvement of the

of patients.

Further research is needed in order to examine those factors which have not been shown to be associated with institutionalism. Further research is also needed to clarify the relationship between each premorbid factor which predisposes to institutionalism and the other premorbid factors. Perhaps a common factor such as "capacity to communicate" may be found to underlie the associations discovered in the present research.

7. Institutionalism from a theoretical point of view

An attempt to construct a theory of institutionalism is beyond the scope of this research project. The findings of associations between some premorbid factors and institutionalism are not sufficient grounds for the construction of such a theory. However, it may not be out of place to express some thoughts concerning institutionalism. These thoughts are not completely out of line with the documented facts.

The review of the history of psychiatric institutions has revealed that during the more enlightened periods in the history of psychiatric care, patients were not only handled with humanity and kindness, and with as little restraint as possible, but also were trusted with tasks and responsibilities.

Research studies which have substantiated contemporary practices in psychiatry, sometimes gathered together under the name "community psychiatry" have documented the following facts: (a) The long stay of patients in "custodial" psychiatric hospitals contributes to institutionalism of such patients (Wing and Brown, 1970), (b) The "social breakdown syndrome" of psychiatric patients can be prevented, in some cases (Gruenberg et al., 1969), (c) Foster homes can produce in chronic psychiatric patients clinical improvement of the same degree as

that produced by psychiatric hospitals (Murphy et al., 1974, 1976), and (d) A comprehensive psychiatric unit in a general hospital, serving a designated catchment area, can replace the mental hospital for the overwhelming majority of psychiatric patients (Hoenig and Hamilton, 1969).

The findings of the present research suggest that in addition to the biological factors responsible for institutionalism (psychiatric illness, physical disability, low intelligence) there are also some psychosocial factors (e.g. illiteracy and lack of communication with others). The lack of communication and illiteracy themselves may again, sometimes, be related to biological factors. The central position that communication between the patient and others (patients, hospital or boarding home staff, family or the community in general) has in psychiatric care, is not a new finding. The modern methods of mental health care delivery (psychiatric units in general hospitals, regional psychiatry, partial hospitalisation, halfway houses, Apte, 1968, boarding homes) have the common element that they encourage communication of the psychiatric patient with others and that they effect the "desegregation of the mentally ill" (Hoenig and Hamilton, 1969).

Improved communication may have beneficial effects for the patient in several ways: (a) it is a form of activity which counteracts the deleterious effects of idleness helping patients, in the same way as work or recreation do. Activity is considered an essential element equally of leisure even by the well known philosopher who wrote an essay "In Praise of Idleness" (Russel, 1966, p. 257 and 258), (b) communication stimulates the psychiatric patient, who often, happens to be understimulated by a combination of morbid pharmacological and environmental factors and (c) it strengthens the self-esteem of the patient and what

Zusman (1966) calls "self-concept" (1966) because it implies a continuous "feed-back" of information about what hospital staff, relatives etc. think of the patient and because the patient feels that he initiates some social interaction.

8. Patients who suffer from institutionalism do not talk enough to be able to tell us about their inner experiences. Only hypotheses can be made about the way they feel. Those psychiatric patients who express their feelings in general do feel proud when they take an active part in their treatment instead of passively receiving care. It is possible that patients who are cast into a completely passive role may not only be more vulnerable to institutionalism but also feel that they lose their identity and self-esteem. Dykens (1971) reviewing Wing and Brown's book on "Institutionalism and Schizophrenia" (1970) concluded that "the adage that the student is a lamp to be lighted and not a vessel to be filled applies equally to the hospitalised chronic schizophrenic patient".

Many philosophers have described how a "person" may become an "object" (Sartre, 1943, p. 326, 502; Buber, 1947; Lichtheim, 1970, p. 63). Perhaps long stay patients affected with institutionalism illustrate well this process.

One patient in this research, when first transferred from the hospital to a boarding home, had to be told by the landlady to go out for a walk in the yard and then he had to be told to stop walking and come inside. To what degree behavior is due to the illness or the environment is difficult to disentangle. There is no doubt, however, that some of it is due to environmental factors.

In addition to the uniformity of the environment the patient in a "custodial" institution tends to lose personal friends, personal interests, personal correspondence (most custodial hospitals censor all

outgoing mail) and personal possessions.

Initiative in such hospitals is discouraged. When asking for discharge the patient has a high chance of getting a stereotypic answer to the effect that the doctor knows best.

89-897 Some "psychosomatic" aspects of institutionalism

The term "psychosomatic" is used here to indicate the hypothesis that institutionalism is due to the combined action of biological and psychosocial factors.

A review of the history of institutionalism indicated that states similar but not identical to institutionalism occur in the inmates of other institutions. "Acedia" was described in monks in the 4th century A.D. (p. 2) and "prisonization" in prisons (p. 12). It was pointed out that "acedia" was a transitory state due to the adaptation difficulties of some monks (p. 12 and 13) and that "prisonization" was a transitory adaptation syndrome. When "total institutions" were compared (Table I.2, p. 11) the essential difference of hospitals from monasteries, prisons and army barracks was found to be that the "admission requirements" for psychiatric hospitals were the presence of mental illness or mental disorder.

The findings of this research indicated that institutionalism was more frequently observed among patients with mental retardation and schizophrenia (p. 83). Among the premorbid factors associated with institutionalism, low intelligence (p. 109) and physical disabilities (p. 119, 121, 122, 123) constituted biological inferiorities. Only education, illiteracy (p. 110, 113) and probably lack of communication and activity (p. 138) among the premorbid factors associated with institutionalism are clearly not biological but psychosocial factors.

One may conclude that the interaction of biological and psychosocial factors lead to institutionalism while the presence only of psychosocial factors and long stay in a "custodial" institution in itself may produce adverse psychological effects but not what in this research has been defined as institutionalism (p. 1).

This is further confirmed by another finding of this research. There were 18 patients who had "good contact with the outside world" and still suffered from institutionalism. Among them the 10 patients with institutionalism who had "very good contact" differed significantly from others in having "biological" inferiorities such as hearing disability, delusions, "troublesome" behavior and being "threatening" in manner.

It appears that the conclusion of other researchers (Murphy et al., 1976) about the relevance of the pathologic process for the clinical and social improvement of patients in hospital wards and foster homes is confirmed by the present research.

An example of the contribution of psychiatric illness to institutionalism is the following case, where the patient might have had some social impoverishment before her admission.

Example of a severely institutionalised patient.

Case # 79, E.K.

The patient is a 58 year old woman. Admitted to the hospital in August 1954, she stayed until 1972 when she was placed in a boarding home. According to the landlady she is extremely slow to move, underactive, mute, never mixes with anyone, shows no leisure interests and needs supervision in her appearance or it would be slovenly. She is not incontinent and her table manners are good. She is completely unoccupied, has no contact with the outside world,

never going home and never having any visitors and has no personal possessions besides a dress, an overcoat and a comb. She has no purse or handbag, cosmetics, ornaments or mirror.

She is a slightly obese, short haired, uncombed lady with stains in her dress. During the interview she does not reply verbally to questions, her affect is judged as flat, her facial expression is apathetic. She remains very hypoactive and without any spontaneity during the interview. Her dress is neglected and her posture is that described by Barton in relation to institutional neurosis: shoulders drooping, head forward, hands held across. She appears vague about her desire to leave or stay in the boarding home. She is capable, however, of reading and writing. Although she came reluctantly, she did not actually resist the interview but she did not cooperate at all. All questions were replied by a half-hearted and distant "yeah" and it was impossible to enlist her cooperation in the Raven's Progressive Matrices. She was the most "institutionalised" patient among the seventy nine patients seen up to the time of her interview.

Her hospital record revealed that she was admitted at the age of 39 from a distant part of Newfoundland after an application of a welfare officer. She had a grade III education. Since age 15 she was "withdrawn, uncommunicative, apathetic" and "on several occasions washed herself in the nude". There was a suspicion of hallucinations as she was seen driving out "ugly things". She stayed home, was filthy and unkempt, listless and slow. She used to read many detective stories and would leave fires unattended. The admission was arranged when the patient's brother came from the U.S.A., a week before admission and found "the patient confused, dirty and untidy". She would only laugh when anyone talked to her. The neighbors told him that she was like this for many years. On admission the diagnosis was "catatonic schizophrenia". She was anxious,

resistive, unkempt, depressed and uncooperative. Her skin was moist and her DTR's increased and symmetrical. Treatment with drugs, ECT and insulin did not produce any appreciable improvement except for some mild improvement in April 1971, on Mellaril. An evaluation of her intellectual functions was unsuccessful, due to the patient's lack of cooperation during the Raven's P.M. test but the psychologist concluded that she was mentally defective.

The "social withdrawal" score in this case was 11.

CHAPTER VI: SUMMARY AND CONCLUSIONS

CHAPTER VI: SUMMARY AND CONCLUSIONSA. SUMMARY

(I) In the first chapter of this thesis institutionalism was defined as a mental and social impoverishment of long stay psychiatric patients.

(I, A, 1) In a preamble the history of the concept of institutionalism was examined. Since the fourth century A.D. when charitable institutions, somehow corresponding to Goffman's definition of "total institutions" (Goffman, 1961) appeared, observations were made on states similar to institutionalism. The first state observed was "acedia", a state of indifference occurring in young monks unable to adapt to the life in a monastery. When the great clinicians in the eighteenth and nineteenth centuries founded psychiatry as the scientific study of mental disorders, they observed the undesirable effects of life in the mental hospital on patients living in institutions. Finally in the twentieth century, especially after World War II and in the more recent years, "institutionalism" was defined, described and researched. (I, A, 2).

Institutionalism must be distinguished from a variety of adaptation reactions occurring in prisons, monasteries, institutions with entirely different populations and function. (I, A, 3) Even psychiatric hospitals differ considerably one from another e.g. in the amount of custodial attitudes of the staff. (I, A, 4) Institutionalism (or "institutional neurosis") has been described by many authors in the last twenty years. Some psychiatric illnesses produce deterioration which is not easily distinguished from institutionalism.

(I, B) Poverty of the social environment in the mental hospital, including lack of contact with the outside world and idleness

were observed to cause institutionalism. Premorbid factors constitute a vulnerability for the patient. Such factors include age, marital state, intelligence, education, occupation, social status, and physical disabilities. Several of the social factors are "block booked", i.e. interrelated, and are probably basically related to the social status of the patient. Social factors often determine admission, discharge, readmission and retention of a psychiatric patient in a mental hospital. The type of psychiatric illness from which the patient suffers determines also the vulnerability of the patient.

(II) The research described in the previous chapters took place in Newfoundland, where the totality of long stay psychiatric patients reside (a) in the mental hospital or (b) in hospital surveyed boarding homes.

(II, 2) The research project aimed at surveying the two groups of long stay psychiatric patients, measuring institutionalism and identifying associations between institutionalism and a number of premorbid factors.

(II, 3) The hypothesis was that younger (below 18) and older (above 65) patients, celibate, mentally retarded, uneducated, those with low occupational and social status and those with physical disabilities will be more vulnerable to institutionalism. (II, 4) Newfoundland appeared to have the advantages of accessibility of patients and records.

(II, 5) All the patients were examined by the researcher himself and only "hard" data were used for the final analysis. (II, 6) An item sheet (questionnaire) was constructed suitable for electronic data processing and measurement tools were selected from those constructed and validated in previous studies of long stay patients. Because institutionalism was defined as a state of social and mental impoverish-

ment (and not as an adjustment reaction to the environment of the hospital or a dependence on the hospital), the measure of "social withdrawal" (Wing and Brown, 1970) was selected for measuring it. Two samples were used: one including the totality of long stay patients in the hospital supervised boarding homes, and one including 50 randomly selected long stay patients from the mental hospital.

(III, 1) Approximately two thirds of the patients surveyed were male. 70% were 45 years old or older. The boarding home population was significantly older than the hospital ward population. The overwhelming majority of the patients were born in Newfoundland and 44.7% were Roman Catholics. There was a high proportion of illiterate and uneducated patients. 85.7% of the patients had never been employed or, if employed, had worked in unskilled jobs. 80.3% of the boarded patients and 92% of the ward patients had never been married. (III, 2) The predominant diagnosis in the boarded patients was schizophrenia and in the hospital ward patients mental retardation. These two diagnoses accounted for 78.8% of all the patients. 17.9% of the boarded patients and 53% of the ward patients were hospitalised only once. The average length of cumulative hospital stay was 142 months for the boarded patients and 197.5 months for the ward patients. The hospital ward patients were more often disabled in vision, hearing, speech, locomotion and manual ability. The prevalence of disability among them varied from 4% (for vision) to 26% (for speech). In the boarded patients the corresponding percentages were 0.7% (for vision) and 8% (for speech). (III, 3) The patients in the hospital wards included a higher percentage of patients with deteriorated speech and mood, with poor information about current events and with illiteracy. 52%

of the boarding home patients and 69% of the hospital ward patients scored at the level of defectives in the Raven's Colored Progressive Matrices.

(IV, 1) Distribution of institutionalism. In the boarding homes 123 patients (44.9%) were found to be free from institutionalism, 70 patients (25%) were found "borderline" in institutionalism and the remaining 81 patients (29.6%) were found to be "institutionalised", i.e. socially withdrawn. In contrast the hospital ward patients were found to be free from institutionalism in 2 instances (4%), "borderline" in institutionalism in 8 instances (16%), while the remaining 40 patients (80%) were found to suffer from institutionalism, i.e. "social withdrawal". Institutionalism was more prevalent among men (44.3%) than women (27.3%).

(IV, 2) The predominant clinical picture in these chronic, long stay, and as a rule free from "disturbing" or "florid" symptomatology, patients is further defined by their scores in some other rating scales. The majority of patients scored normal in "troublesome behavior" (79.3%) and in "socially embarrassing behavior" (69.8%).

(IV, 3) Relationship between institutionalism and premorbid factors. Of the eleven premorbid factors hypothesised to be associated with institutionalism six were significantly associated: (a) low intelligence, (b) low education, (c) decreased hearing, (d) impaired speech, (e) disability in locomotion, and (f) manual disability.

There was a highly significant association between institutionalism and subnormal intelligence (below the 5th percentile as measured by the Raven's Coloured Progressive Matrices).

Institutionalism was also associated specifically with the diagnosis of mental retardation. Education below the third grade in school was very highly significantly associated with institutionalism. An equally

(very highly) significant association existed between illiteracy and institutionalism. Indeed, the association was also stronger as measured by correlation. This association stood even when it was examined only for the non-mentally retarded patients. Severe hearing disability (on first admission) was associated with institutionalism. Speech disability due to organic factors (and recorded on first admission) was very highly significantly associated with institutionalism. Significant associations were also found between disability on locomotion (on first admission) and manual disability (on first admission) and institutionalism.

The findings of the study did not allow the researcher to conclude that an association exists between extremes of age (i.e. age below 18 or above 65) on first admission and institutionalism. Celibacy, an unskilled job (or unemployment) before admission, an unskilled occupation of the patient's father were not associated with institutionalism. The same absence of significant association, in the data of this research, was concluded in the relationship between visual disability and institutionalism.

The typical patient vulnerable to institutionalism was, in conclusion, a mentally retarded or schizophrenic patient, intellectually and educationally deprived and perhaps burdened with one or more disabilities in speech, hearing, locomotion and manual ability.

B. CONCLUSIONS

(V, A) In discussing the above findings it was first indicated that the hypothetical average patient (a fictional patient constructed on the basis of mean values) was (a) in the boarding homes a man from Newfoundland outside Avalon Peninsula, 53.7 years old, unskilled or unemployed, never married, diagnosed as schizophrenic, admitted to the mental hospital 3.7 times, who stayed in the hospital a cumulative length

of time of 11 years and 10 months and in boarding care another 5 years and 7 months, (b) In the hospital wards the hypothetical average patient was a man from Newfoundland outside the Avalon Peninsula, 42 years old, unskilled or unemployed, never married, diagnosed as mentally retarded admitted to the mental hospital 2 times, who stayed in the hospital for a cumulative duration of 16 years and 8 months and in the boarding homes only 8 months in the past. Selective factors operated probably on first admission, discharge, readmission and retention and explain the skewing of both groups towards the uneducated, unskilled, celibate and generally "underprivileged" or "deprived" patient. Selective factors are also the main explanation of the difference of the two groups. The typical patient in the boarding homes is not very different from the "average foster home patient" described by the Montreal group of researchers (Murphy et al., 1974).

(V, B) Institutionalism as measured in this research was found in 29% of the boarding home patients and, therefore, no matter what the value of boarding homes a disappearance of institutionalism is not to be expected simply by replacing long stay hospital wards with boarding homes. Institutionalism is not confined to schizophrenic patients.

The premorbid factors found to be associated with institutionalism in this study affect communication directly (e.g. speech and hearing disability, intelligence, education interfere with communication) or indirectly by depriving an individual of opportunities to communicate (locomotor and manual disability). Lack of contact with the outside world is significantly associated with institutionalism. Those who were found to suffer from institutionalism despite the fact that they were not cut off from the outside world (i.e. while being "in good contact") tend to be threatening in manner (not in action), deluded, troublesome

and with affected hearing. Another common factor, possibly underlying those premorbid features which were found to constitute a vulnerability to institutionalism, was lack of occupation at the time of the survey, i.e. idleness.

The findings of this research seem to confirm the findings of Wing and Brown (1970) by extending them to both sexes, all diagnoses, both hospital and boarding home settings and to several premorbid factors. The findings also confirm the findings about the typical foster home patient of the McGill group (Murphy et al., 1974) and their observation that social skills are rarely improved in foster homes.

The practical implication of the findings seems to be that some identifiable categories of patients are more vulnerable to institutionalism and, therefore, should be given a greater amount of hospital staff attention and care. This is more so because these categories of patients are the least demanding or capable and likely to attract the staff's attention and interest.

The findings are not sufficient to allow for the construction of a theory of institutionalism. They appear not to be out of line with the importance accorded to communication and individuality for human existence. They also suggest that institutionalism in contrast to some transitory adaptation syndromes occurring in monasteries and prisons, is the result of a combination of biological and psychosocial factors.

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APPENDIX "A"

APPENDIX A
THE ITEM SHEET ("QUESTIONNAIRE")

Survey Number ...

Patient's Name ... Last First Middle

Address ...

Name of Landlady (or nurse in charge) ...

Home or Ward (Code Number ...)

(Name ...)

Date of Interview ...

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PART I

INFORMATION RECORDED BEFORE THE INTERVIEW

Item	Column	
1.	1, 2, 3	---- <u>Survey Number</u>
2.	5, 6	---- <u>Number of "home" or ward</u> ("Code Number")
3.	7, 8	---- <u>Number of patients</u> in the same home or ward
4.	9	---- <u>Type of home</u> <u>1.</u> Only male patients <u>2.</u> Only female patients <u>3.</u> Mixed
5.	11,12,13,14,15	---- <u>Hospital Number</u>
6.	17	-- <u>Sex of Patient</u> <u>1.</u> Male <u>2.</u> Female
7.	18	-- <u>Place of Birth</u> <u>1.</u> St. John's <u>2.</u> Avalon, outside St. John's <u>3.</u> Nfld. excluding Avalon <u>4.</u> Labrador <u>5.</u> Other provinces <u>6.</u> Other country (specify) ... <u>9.</u> NK
8.	19,20	-- <u>Age of Patient at Time of Interview</u> <u>99.</u> NK
9.	21	-- <u>Marital Status at Time of Interview</u> <u>1.</u> Single (never married) <u>2.</u> Married <u>3.</u> Widowed <u>4.</u> Divorced <u>5.</u> Separated <u>6.</u> Other (specify) ... <u>9.</u> NK
10.	22	-- <u>Religion at Time of Interview</u> <u>1.</u> Church of England <u>2.</u> Roman Catholic <u>3.</u> Salvation Army <u>4.</u> United Church <u>5.</u> Pentecostal <u>6.</u> Other (specify) ... <u>7.</u> NK

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PART I (Continued)

Item	Column	
11.	23	-- <u>Who Pays Expenses for Present Care of Patient</u> ___ 1. Department of Public Welfare ___ 2. Other community agency (specify)... ___ 3. Patient's family or other individual ___ 4. Patient's income from estate ___ 5. Patient's income earned through present employment (specify) ... ___ 6. Combination of above ___ 7. N.A. ___ 9. NK
12.	24	-- <u>Was the Patient certified for admission</u> ___ 1. Yes ___ 2. No ___ 9. NK
13.	25	-- <u>Chronic illness or physical disability at present</u> ___ 1. Yes (specify) ... ___ 2. No ___ 9. NK

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Item	Column	
18.	30	-- <u>Occupation, usual (most common) of husband (specify) ...</u>
		<ul style="list-style-type: none"> <u>1.</u> Professional, managerial, technical <u>2.</u> Sales, clerical <u>3.</u> Skilled trades <u>4.</u> Semi-skilled, services <u>5.</u> Fishing, mining, labour <u>6.</u> None <u>8.</u> N.A. (specify) ... <u>9.</u> NK
19.	31	-- <u>Occupation, usual, father (specify) ...</u>
		<ul style="list-style-type: none"> <u>1.</u> Professional, managerial, technical <u>2.</u> Sales, clerical <u>3.</u> Skilled trades <u>4.</u> Semi-skilled, services <u>5.</u> Fishing, mining, labour <u>6.</u> None <u>8.</u> N.A. (specify) ... <u>9.</u> NK
20.	32	-- <u>Employment (during one year prior to first psychiatric admission)</u>
		<ul style="list-style-type: none"> <u>1.</u> Regularly employed, full time <u>2.</u> Regularly employed, part time <u>3.</u> Irregularly employed <u>4.</u> Seasonally employed <u>5.</u> Unemployed <u>6.</u> Retired <u>7.</u> N.A. (specify) ... <u>9.</u> NK
21.	33	-- <u>Vision on first psychiatric admission</u>
		<ul style="list-style-type: none"> <u>1.</u> Normal <u>2.</u> Moderately affected <u>3.</u> Severely affected <u>9.</u> NK
22.	34	-- <u>Hearing on first psychiatric admission</u>
		<ul style="list-style-type: none"> <u>1.</u> Normal <u>2.</u> Moderately affected <u>3.</u> Severely affected <u>9.</u> NK
23.	35	-- <u>Speech on first psychiatric admission</u>
		<ul style="list-style-type: none"> <u>1.</u> Normal <u>2.</u> Moderately affected <u>3.</u> Severely affected <u>9.</u> NK

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Item	Column	
24.	36	-- <u>Locomotion on first psychiatric admission</u> <u>1.</u> Normal <u>2.</u> Moderately affected <u>3.</u> Severely affected <u>4.</u> NK
25.	37	-- <u>Manual motor ability on first psychiatric admission</u> <u>1.</u> Normal <u>2.</u> Moderately affected <u>3.</u> Severely affected <u>9.</u> NK
26.	38,39	-- <u>Number of psychiatric admissions</u> 99 NK
27.	40,41,42	---- <u>Months elapsed between first psychiatric symptoms and first psychiatric admission</u> 999 NK
28	43,44,45	---- <u>Months elapsed between first psychiatric admission and present survey</u> 888 NA 999 NK
29.	46,47,48	---- <u>Cumulative duration of all psychiatric hospitalizations (months)</u> 888 NA 999 NK
30	49,50,51	---- <u>Cumulative duration of all boarding care in "homes" (months)</u> 888 NA 999 NK
31.	52	-- <u>"Antisocial tendencies" in the personality and behavior of the patient</u> <u>1.</u> None. Described as normal prior to first psychiatric admission <u>2.</u> Yes. Described as abnormal (specify below) <u>8.</u> N.A. <u>9.</u> N.K.

Specify abnormality and copy details from record (also specify whether abnormality preceded first symptoms) ...

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Item	Column	
32.	53	-- <u>Number of arrests by police prior to first psychiatric admission</u> <u>8. Eight or more</u> <u>9. NK</u> Specify ...
33.	54	-- <u>Number of charges against patient prior to first psychiatric admission</u> <u>8. Eight or more</u> <u>9. NK</u> Specify ...
34.	55	-- <u>Number of sentences of patient prior to first psychiatric admission</u> <u>8. Eight or more</u> <u>9. NK</u> Specify ...
35.	56,57,58,59,60	---- <u>Latest psychiatric diagnosis. Primary (ICD)</u> 99999 N.K.
36.	61,62,63,64,65	---- <u>Latest psychiatric diagnosis Secondary (ICD)</u> 99999 NK
37.	66,67,68,69,70	---- <u>Latest psychiatric diagnosis. Tertiary (ICD)</u> 99999 NK
38.	71,72,73	--- <u>IQ First evaluation</u> 666 Evaluation attempted, no conclusions 777 Evaluation made, category determined, no figures 888 Other (specify) ... 999 NK Date of Evaluation ... Name of test ...
39.	74,75,76	--- <u>Verbal score. First evaluation</u> 666 Evaluation attempted, no conclusions 777 Evaluation made, category determined, no figures 888 Other (specify) ... 999 NK

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Item	Column	
40.	77,78,79	---- <u>Performance score. First evaluation</u> 666 Evaluation attempted, no conclusions 777 Evaluation made, category determined, no figures 888 Other (specify) ... 999 NK
	80	-- ...
	81.82,83	---- <u>Survey number (repeated)</u>
41.	84	-- <u>Subtests of IQ test. First evaluation</u> 1. Available 2. Not available 3. N.A. Subtests: a) Information ... Comprehension ... Digit span ... Similarities ... Vocabulary ... Arithmetic ... b) Picture completion ... Block design ... Object assembly ... Picture arrangement ... Digit-symbol ...
42.	85.86,87	---- IQ. <u>Latest evaluation</u> 666 Evaluation attempted, no conclusion 777 Evaluation made, category determined, no figures 888 Other (specify) ... 999 N.K. Date ... Type of test ...
43.	88,89,90	---- <u>Verbal Score. Latest evaluation</u> 666 Evaluation attempted, no conclusion 777 Evaluation made, category determined, no figures 888 Other (specify) ... 999 NK
44.	91,92,93	---- <u>Performance Score. Latest evaluation</u> 666 Evaluation attempted, no conclusion 777 Evaluation made, category determined, no figures 888 Other 999 NK

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Item	Column	
45.	94	-- <u>Subtests of IQ test. Latest evaluation</u> 1. Available 2. Not available 3. N.A. Subtests: a) Information ... Comprehension ... Digit span ... Similarities ... Vocabulary ... Arithmetic ... b) Picture completion ... Block design ... Object assembly ... Picture arrange- ment ... Digit-symbol ...
46.	95	-- <u>Any other psychological testing in hospital records</u> 1. Yes 2. No 9. NK

If answer to above item #46 is Yes specify

Date	Test	Conclusions
------	------	-------------

Copy conclusions of psychologist based on skill or aptitude tests:

Copy conclusions of psychologist based on vocational tests:

Copy conclusions of psychologist based on personality tests:

Item	Column	
47.	96	-- <u>Did the patient undergo brain surgery</u> 1. Yes 2. No 9. NK If yes specify ... Date ... Type of operation ... Comments ... Source of collection of information (comment here on reliability of source of informa- tion)

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PART III

OBSERVATIONS MADE DURING INTERVIEW WITH PATIENT

Item	Column	<u>RATING SCALE</u>
48.	97	-- <u>Speech (Record highest observed)</u> _1. Replies to questions, relevantly and coherently _2. Replies to questions, partially irrelevantly and/or incoherently _3. Replies to questions, wholly irrelevantly and/or incoherently _4. Leaves many questions unanswered verbally _5. Does not reply verbally to questions _6. NK
49.	98	-- <u>Mood (depression or elation)</u> _1. Normal (as far as depression or elation are considered). _2. Moderately depressed or elated _3. Severely depressed or elated _4. Inaccessible to examination _9. NK
50.	99	-- <u>Mood (other abnormalities: anxiety, tension, irritability, lability or any excl. depression, elation)</u> _1. No abnormality _2. Moderate abnormality _3. Severe abnormality _4. Inaccessible to examination _9. NK
51.	100	-- <u>Mood (depression - elation) Direction of change</u> _1. Normal _2. Depression _3. Elation _4. Inaccessible to examination _9. NK
52.	101	-- <u>Delusions</u> _1. Has never been deluded _2. Not deluded at present but had delusions in the past _3. Deluded at present _4. Inaccessible to examination _9. NK

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Item	Column	
53.	102	<p>-- <u>Hallucinations</u></p> <p>__1. Does not have hallucinations at present nor in the past</p> <p>__2. Does not have hallucinations at present but had them in the past</p> <p>__3. Has hallucinations at present</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>
54.	103	<p>-- <u>Temporal orientation (Date)</u></p> <p>__1. Correct or only minor mistakes (up to one week either direction)</p> <p>__2. Serious mistakes (more than a week but less than a year)</p> <p>__3. Complete disorientation (a year or more)</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>
55.	104	<p>-- <u>General information</u></p> <p>__1. Well informed about current events</p> <p>__2. Some information about current events but with serious gaps or mistakes</p> <p>__3. No information about current events</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>
56.	105	<p>-- <u>Facial expressions (apathy) during the interview</u></p> <p>__1. Normal expression of emotion</p> <p>__2. Moderate lack of expression</p> <p>__3. Marked lack of expression</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>
57.	106	<p>-- <u>Lack of spontaneity manifested during the interview</u></p> <p>__1. Normal</p> <p>__2. Moderate lack of spontaneity</p> <p>__3. Marked lack of spontaneity</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>
58.	107	<p>-- <u>Hyperactivity during the interview</u></p> <p>__1. Normal (no hyperactivity)</p> <p>__2. Moderate hyperactivity</p> <p>__3. Marked hyperactivity</p> <p>__4. Inaccessible to examination</p> <p>__9. NK</p>

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- | Item | Column | |
|------|--------|--|
| 59. | 108 | -- <u>Hypoactivity during the interview</u>
<u>1.</u> Normal (no hypoactivity)
<u>2.</u> Moderate hypoactivity
<u>3.</u> Marked hypoactivity
<u>4.</u> Inaccessible to examination
<u>9.</u> NK |
| 60. | 109 | -- <u>Neglected dress</u>
<u>1.</u> Yes
<u>2.</u> No
<u>8.</u> NA
<u>9.</u> NK |
| 61. | 110 | -- <u>Special care in appearance</u>
<u>1.</u> Yes
<u>2.</u> No
<u>8.</u> NA
<u>9.</u> NK |
| 62. | 111 | -- <u>Abnormal posture (shoulders drooped,
 head forward, hands held across,
 shuffling gait)</u>
<u>0.</u> Normal posture. None of the above
and no other abnormality
<u>1.</u> One of the above
<u>2.</u> Two of the above
<u>3.</u> Three of the above
<u>4.</u> All four of the above
<u>5.</u> Other abnormality (specify) ...
<u>8.</u> NA
<u>9.</u> NK |
| 63. | 112 | -- <u>Vision during the interview</u>
<u>1.</u> Normal
<u>2.</u> Moderately affected
<u>3.</u> Severely affected
<u>9.</u> NK |
| 64. | 113 | -- <u>Hearing during the interview</u>
<u>1.</u> Normal
<u>2.</u> Moderately affected
<u>3.</u> Severely affected
<u>9.</u> NK |
| 65. | 114 | -- <u>Speech during the interview (organic
 conditions)</u>
<u>1.</u> Normal
<u>2.</u> Moderately
<u>3.</u> Severely affected
<u>9.</u> NK |

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- | Item | Column | |
|--|--------|--|
| 66. | 115 | -- <u>Locomotion during the interview</u>
<u>1.</u> Normal
<u>2.</u> Moderately affected
<u>3.</u> Severely affected
<u>9.</u> NK |
| 67. | 116 | -- <u>Manual ability during the interview</u>
<u>1.</u> Normal
<u>2.</u> Moderately affected
<u>3.</u> Severely affected
<u>9.</u> NK |
| SCALES FOR RATING SCHIZOPHRENIC SYMPTOMS | | |
| 68. | 117 | -- 1. <u>Flatness and incongruity of affect</u>
<u>1.</u> No evidence
<u>2.</u> Indirect evidence only
<u>3.</u> Occasional episode of definite flatness or incongruity but mainly appropriate affect
<u>4.</u> After mostly inappropriate or flat, but occasional appropriate
<u>5.</u> Complete flattening. No affect unless incongruous
<u>9.</u> NK |
| 69. | 118 | -- 2. <u>Poverty of Speech</u>
<u>1.</u> No evidence
<u>2.</u> Indirect evidence only
<u>3.</u> Definite vagueness, stereotypy, repetitiveness or wandering, but interview relatively intact
<u>4.</u> So vague, wandering, repetitive or stereotyped, that interview almost impossible
<u>5.</u> Mute or almost mute
<u>8.</u> N.A. (e.g. mute due to organic causes)
<u>9.</u> NK |
| 70. | 119 | -- 3. <u>Incoherence of speech</u>
<u>1.</u> No evidence
<u>2.</u> Indirect evidence only
<u>3.</u> Definite incoherence, but rest of interview little affected
<u>4.</u> Definite incoherence, interfering markedly with interview
<u>5.</u> Practically nothing coherent
<u>6.</u> NK |

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- | Item | Column | |
|------|--------|--|
| 71. | 120 | <p>-- 4. <u>Coherent delusions</u></p> <p>___ 1. No pre-occupation evident</p> <p>___ 2. Indirect evidence only
(marked evasion)</p> <p>___ 3. Some evidence of coherently expressed delusions, but these have little force now. Little active pre-occupation</p> <p>___ 4. Evident active pre-occupation, but can give attention to other matters</p> <p>___ 5. Can hardly attend to anything else</p> <p>___ 9. NK</p> |
| 72. | 121 | <p>-- <u>Classification based on above Items , , scores)</u></p> <p>___ 0. No symptoms at interview. Rating 1 or 2 on all scales ("1a")</p> <p>___ 1. Moderate symptoms only. Rating 1,2, 3 on all scales ("1b")</p> <p>___ 2. Moderate poverty of speech. Rating 3) but rating 4 or 5 on affect ("1c")</p> <p>___ 3. Coherent delusions. Rating 4 or 5 ("2")</p> <p>___ 4. Incoherence of speech. Rating 4 or 5 ("3")</p> <p>___ 5. Poverty of speech with rating 4 ("4")</p> <p>___ 6. Mute or almost mute. Rating 5 on poverty of speech ("5")</p> <p>___ 9. NK</p> |
| 73. | 122 | <p>-- <u>Attitude towards discharge</u></p> <p>___ 1. Wishes to leave</p> <p>___ 2. Ambivalent or vague</p> <p>___ 3. Indifferent</p> <p>___ 4. Wishes to stay</p> <p>___ 5. Not accessible</p> <p>___ 6. Indirect evidence of satisfaction</p> <p>___ 7. Indirect evidence of dissatisfaction</p> <p>___ 9. NK</p> |

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Item	Column	
74.	123	-- <u>Place of residence during the first 15 years of life (place where patient spent most of the time)</u> 1. St. John's 2. Urban Nfld. 3. Rural Nfld. 4. Urban elsewhere 5. Rural elsewhere 9. NK
75.	124	-- <u>Relatives in St. John's</u> 1. Yes (specify eg. "child" or "spouse" or "cousin") ... 2. No 3. NK
76.	125	-- <u>Visitors</u> 1. Yes (specify relative or friend) ... 2. No 9. NK
77.	126	-- <u>Religion in childhood</u> 1. Same as at present 2. Different (specify childhood religion) ... 9. NK
78.	127	-- <u>Present ability to read and write</u> 0. Cannot read or write (except his name) 1. Can read printed paragraph only, cannot write 2. Can read both printed and hand-written, cannot write 3. Can write but cannot read 4. Can write and read printed paragraph only 5. Can write and read 8. NA 9. NK

--15--

- | Item | Column | |
|------|--------|--|
| 79. | 128 | -- <u>School (highest level passed) as reported by patient</u> |
| | | <ul style="list-style-type: none"> <input type="checkbox"/> 0. None <input type="checkbox"/> 1. Less than grade 3 <input type="checkbox"/> 2. Grade 3 to grade 6 <input type="checkbox"/> 3. Grade 7 or 8 <input type="checkbox"/> 4. Grade 9 or 10 <input type="checkbox"/> 5. Grade 11 <input type="checkbox"/> 6. College (partial) or Trade School (partial or complete) <input type="checkbox"/> 7. College (degree) <input type="checkbox"/> 8. Other (specify) <input type="checkbox"/> 9. NK |
| 80. | 129 | -- <u>Occupation reported by patient</u>
<u>Specify ...</u> |
| | | <ul style="list-style-type: none"> <input type="checkbox"/> 1. Professional, managerial, technical <input type="checkbox"/> 2. Sales, Clerical <input type="checkbox"/> 3. Skilled trades <input type="checkbox"/> 4. Semi-skilled, services <input type="checkbox"/> 5. Fishing, mining, labor <input type="checkbox"/> 6. Housewife <input type="checkbox"/> 7. None <input type="checkbox"/> 8. NA <input type="checkbox"/> 9. NK |
| 81. | 130 | -- <u>Occupation of husband as reported by patient (specify) ...</u> |
| | | <ul style="list-style-type: none"> <input type="checkbox"/> 1. Professional, managerial, technical <input type="checkbox"/> 2. Sales, clerical <input type="checkbox"/> 3. Skilled trades <input type="checkbox"/> 4. Semi-skilled, services <input type="checkbox"/> 5. Fishing, mining, labor <input type="checkbox"/> 6. None <input type="checkbox"/> 8. NA <input type="checkbox"/> 9. NK |
| 82. | 131 | -- <u>Occupation of father as reported by patient (specify) ...</u> |
| | | <ul style="list-style-type: none"> <input type="checkbox"/> 1. Professional, managerial, technical <input type="checkbox"/> 2. Sales, clerical <input type="checkbox"/> 3. Skilled trades <input type="checkbox"/> 4. Semi-skilled, services <input type="checkbox"/> 5. Fishing, mining, labor <input type="checkbox"/> 6. None <input type="checkbox"/> 8. NA (specify) ... <input type="checkbox"/> 9. NK |

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Item	Column	PROGRESSIVE MATRICES (RAVEN)	
83.	132,133	-----	<u>Total Score</u> 99 NK
84.	134,135	-----	<u>Percentile</u> 99 NK
85.	136	--	<u>Ambulant or not</u> <u>1.</u> Ambulant <u>2.</u> Bedridden due to chronic (or chronic plus acute) illness <u>3.</u> In bed due to acute illness <u>9.</u> NK

NON CODED OBSERVATIONS

(a) Mental State: General behavior, talk, sample of talk, mood, delusions, hallucinations, compulsive phenomena, orientation, memory, attention, general information, intelligence, insight, and judgment.

(b) Any other observation

illness

score

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PART IV

INFORMATION COLLECTED IN INTERVIEW WITH LANDLADY (NURSE)

Item	Column	
86.	137	-- <u>Chronic illness (physical illness only)</u> <u>1.</u> Yes (specify) ... <u>2.</u> No <u>9.</u> NK
87.	138,139,140,141,142	----- <u>Diagnosis of chronic physical illness (ICD)</u> 99999 NK
88.	143	-- <u>Receiving drugs for psychiatric symptoms</u> <u>1.</u> Yes <u>2.</u> No <u>9.</u> NK
89.	144	-- <u>Receiving drugs for physical symptoms</u> <u>1.</u> Yes <u>2.</u> No <u>9.</u> NK
		SOCIAL BREAKDOWN SYNDROME
90.	145	-- <u>Troublesome behavior</u> <u>0.</u> <u>Any</u> of the following: 1. considered suicidal. 2. Harmed self. 3. Was placed in restraint. 4. Was physically controlled during the night. 5. Resisting eating a meal. 6. Was assaultive. 7. Was incontinent. 8. Resisted arising. 9. Resisted going to bed. 10. Was mute during the entire week. <u>1.</u> <u>Any</u> of the following (but none of the above, Score 0 items): 1. Precautions were taken to prevent self-harm. 2. Was restricted to part of the ward or was held for a period. 3. Wandered and resisted returning to bed at night. 4. Needed much help at meals. 5. Was noisy or threatening 6. Had to be escorted to the toilet. 7. Needed much help in dressing 8. Needed much help in going to bed 9. Did not initiate conversation during the entire week <u>2.</u> None of the above (score 0 or score 1 items) reported <u>9.</u> NK

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Item	Column	
91.	146	<p>-- <u>Patient's function</u></p> <p><u>0.</u> The following reported during the entire week: 1. Never away from supervision of ward staff. 2. Did no work. 3. Did not attend occupational therapy sessions. 4. Did no reading or writing 5. Had no recreation</p> <p><u>1.</u> None of the following: 1. Away from supervision for three or more hours. 2. Worked or did OT for two or more hours. 3. Read or wrote for one hour or more or participated in active recreation.</p> <p><u>2.</u> One or two of the above (score 1) items reported</p> <p><u>3.</u> All three of the above (score 1) items reported</p> <p><u>9.</u> NK</p>
		WARD OR "HOME" BEHAVIOUR SCALES
92.	147	<p>-- 1. <u>Slowness of Movement</u></p> <p>(2) Usually extremely slow to move, e.g. took very much longer over a meal, or dressing, or walking across the ward, than other patients.</p> <p>(1) Showed periods of extreme slowness of movement as in (2), but at other times was not slow to move.</p> <p>(0) Speed of movement normal</p>
93.	148	<p>-- 2. <u>Underactivity</u></p> <p>(2) Stood or sat in one place all the time, with little movement. Even with encouragement was very difficult to get moving.</p> <p>(1) Showed periods of extreme underactivity as in (2), but at other times was not under-active.</p> <p>(0) Showed no marked underactivity</p>
94.	149	<p>-- 3. <u>Over-activity</u></p> <p>(2) Usually extremely over-active or restless, eg. paced rapidly up and down became excited, talked or sang loudly or wildly, etc.</p> <p>(1) Showed periods of extreme over-activity as in (2) but at other times was not over-active</p> <p>(0) Showed no marked over-activity</p>

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Item	Column	
95.	150	-- 4. <u>Conversation</u> (2) Was mute or almost mute (1) Said a few words, eg. in reply to questions, but was usually silent (0) Ordinary conversation
96.	151	-- 5. <u>Social withdrawal</u> (2) Never mixed socially with anyone even when encouraged to do so (1) Was socially withdrawn and solitary but would mix a little with others if encouraged to do so (0) Normal social mixing
97.	152	-- 6. <u>Leisure Interests</u> (2) Showed no interest in anything. Did not watch television, read newspapers, play games etc. even when encouraged to do so. (1) Showed very little interest, but could be persuaded to watch TV, read papers, join in games, etc. for a while. (0) Showed normal spontaneous interests.
98.	153	-- 7. <u>Laughing and talking to self</u> (2) Frequent episodes (once a day or more often) of laughing or talking out loud - not just constant smiling. (1) Occasional episodes of laughing or talking out loud, but these did not occur every day. (0) No such episodes noted.
99.	154	-- 8. <u>Posturing and Mannerisms</u> (2) Adopted odd or uncomfortable postures, or made bizarre movements, every day (1) Behaved as in (2), but less often than every day (0) No such behaviour seen

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Item	Column	
101	156	-- 10. <u>Personal hygiene</u> (2) Was incontinent on at least one occasion during the week (1) Needed raising at night, or escorting to lavatory during the day in case of incontinence, but was not actually incontinent when this was done. (0) Needed no escorting or raising and was not incontinent
102	157	-- 11. <u>Personal appearance</u> (2) Needed to be shaved (if male), washed or dressed fully at least once during the week (1) Could shave, dress or wash, but needed supervision with the buttons etc. or would be slovenly in appearance (0) Needed no supervision of this kind. Maintained reasonably neat appearance without prompting
103	158	-- 12. <u>Behaviour at meal times</u> (2) Needed spoon-feeding at least once during the week (1) Did not require spoon-feeding, but had to wear bib, or needed supervision because of faulty table manners (0) Normal behaviour at meal times
	159,160	--
	161,162,163	---- <u>Survey number (repeat)</u>
104.	164,165	--- <u>Social withdrawal</u> (1,2,&4,5,6,&10,11,12) 99 NK
105.	166,167	-- <u>Socially embarrassing behaviour</u> (3,7,8,9) 9 NK

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Item	Column	
106.	168,169	<p>-- <u>Patient's occupation during the past month</u></p> <p>99 NK Score</p> <p>15. Work outside hospital or home</p> <p>10. Industrial work</p> <p>9. Unsupervised work</p> <p>8. Work in service departments (stores bakehouse etc.)</p> <p>7. Domestic work</p> <p>6. Competent ward work</p> <p>5. Daily occupational therapy</p> <p>4. Supervised working party (eg. on grounds, drive etc.)</p> <p>3. Reliable washing-up (1-3 hours ward work)</p> <p>2. Occasional occupational therapy</p> <p>1. Very little ward work, no occupational therapy</p> <p>0. Unemployed</p>
107.	170,171	<p>-- <u>Contact with the outside world</u></p> <p>99 NK Score</p> <p>15. Goes home regularly, has visitors</p> <p>13. Goes home regularly, no visitors</p> <p>11. Goes home occasionally, visitors</p> <p>9. Goes home occasionally, no visitors</p> <p>6. Does not go home, visited regularly</p> <p>4. Does not go home, visited occasional</p> <p>3. Does not go home, no visitors</p> <p style="text-align: center;">PERSONAL POSSESSIONS</p>
108.	172	<p>-- <u>Dress or suit</u></p> <p>1. Yes</p> <p>2. No</p> <p>9. NK</p>
109.	173	<p>-- <u>Overcoat</u></p> <p>1. Yes</p> <p>2. No</p> <p>9. NK</p>
110.	174	<p>-- <u>Brush, comb</u></p> <p>1. Yes</p> <p>2. No</p> <p>9. NK</p>

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Item	Column	
111.	175	-- <u>Purse, handbag or wallet</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK
112.	176	-- <u>Toothbrush</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK
113.	177	-- <u>Make-up or cosmetics</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK
114.	178	-- <u>Personal ornament</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK
115.	179	-- <u>Mirror</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK
116.	180	-- <u>Nail files or scissors</u> <input type="checkbox"/> 1. Yes <input type="checkbox"/> 2. No <input type="checkbox"/> 9. NK

OTHER OBSERVATIONS AND COMMENTS:

APPENDIX "B"

APPENDIX B

16, 17, 18, 19

DEFINITIONS AND INSTRUCTIONS FOR SCORES IN THE ITEM SHEET ("QUESTIONNAIRE")

General instruction: Whenever more than one score appears applicable in the case under examination for a certain item the highest score must be recorded.

FRONT PAGE

The front page must be filled at the same time with page one. As all confidential information is recorded in the front page this page is to be detached after the examination of the patient. This procedure must be explained to all landladies and nurses before asking them any questions, as this will reassure them about the importance and care given to confidentiality of the information collected, and will increase their cooperation. Before detaching the page a check must be made to ensure that numbers in the front page and page one are identical.

<u>Item number</u>	<u>Definition</u>
PART I	
1	Serial number assigned to each patient
2	Serial number assigned to each boarding home or hospital ward
3	Refers to the number of patients in the latest monthly list of the homes or the daily census of the hospital
5	The serial number of the hospital record
8	Age on latest birthday
9	As recorded in the hospital records, the latest entry
10	As recorded in the hospital records, the latest entry
11	As recorded in the latest monthly list
13	As recorded in the hospital record
PART II	
14	As reported in the hospital record, e.g. the certification papers or the nurses' notes.
15	Refer to grade completed (except for score 6 or 8)

- 16,17,18,19 Apply the rules utilised by the Community Medicine research projects of the Memorial University of Newfoundland.
- 18 If several marriages, record the highest occupation
- 20 School attendance, work of twenty or more hours per week, work in shifts are all considered as regular. Irregular refers to clear statements in the record of frequent absences or periods of unemployment during the last year
- 20,21,22,23,24,25 Refer to statements in the nurses' notes or reports of the relatives and are taken at face value. Do not score according to medical statements. For example: if the nurses' notes describe a patient as incapable of walking, describe the patient as severely affected, in locomotion, if as needing assistance, score as moderately affected.
- 26 If an admission to a general hospital is reported as the clear result of a psychiatric condition it is to be considered as psychiatric admission
- 27,28,29,30 Only complete months are recorded
- 31 Record only if clear statements are in the record. In case of doubt score 9
- 32 Does not include police action associated to circumstances of admission, or arrest by police because of abnormal behavior, such as walking aimlessly, exposing in public etc.
- 35 Latest diagnosis refers to the diagnosis of a chronic illness, not a superimposed reaction, e.g. the statement in the record depressive reaction, in a patient consistently diagnosed as schizophrenic is not taken as latest diagnosis unless the psychiatrist contested the previous diagnosis or indicated that he considered the patient as recovered. If the diagnosis cannot be coded as one of those appearing in I.C.D. it is considered as NK. The coding 319,0 is reserved for the cases where the discharging psychiatrist admits that he has no diagnosis to offer.
- 38.39,40,41 When a range of IQ is given the arithmetic mean is entered. IQ's done in the outpatient department or in other agencies are recorded in the absence of a test of intelligence done in the hospital.

PART III

- 48,49,52,53,54,55 Taken from Harris et al. (1967) scale and applied as the authors advise
- 56 Subjective evaluation of the observer. Includes extra-pyramidal as well as due to psychiatric symptoms and abnormalities
- 57 Subjective evaluation of the observer, based on observations regarding greeting, choice of chair in the start of the interview, spontaneous questions of the patient, smoking
- 58 Includes agitation, akathisia due to drug effects, restlessness and excitement
- 59 Any reduction of movement regardless of etiology
- 60 Unbuttoned clothes, spots, dirty clothes
- 61 Careful grooming, any make-up, any matching of colors, wearing a tie
- 62 Score 5 only if score 1, 2 3 and 4 and inapplicable
- 63,64,65,66,67 Mild degrees of disability are not recorded here. For example, disabilities reported by the patient or others but not observed are not recorded
- 68,69,70,71,72,73 Rating is based on the instructions given by Wing and Brown (1970).
- 74 Score 2 for Gander, Windsor, Grand Falls, Corner Brook, Stephenville, Port-aux-Basques. Score 4 or 5 according to the patient's opinion.
- 76 Score 1 even if the patient reports only one visit in the last six months
- 78 Tested by reading a typed and a handwritten paragraph describing the climate of the province
- 79,80,81,82 Criteria the same as those for 16, 17, 18, 19.
- 83,84 Administered in the standard method.
- 85 2 includes wheelchair patients

PART IV

- 86 Serious enough to require at least one examination by another physician in addition to the psychiatrist in charge of the case, or serious enough to necessitate

drugs (other than those sold without prescription, i.e. laxatives, antacids, simple analgesics) or a special diet or restrictions of activity or other precautions. Constipation, gastric hyperacidity, common headaches, mild skin diseases not needing referral to a specialist are not recorded.

- 87 Left blank in physically healthy individuals
- 89 Anticonvulsants are recorded here.
- 90, 91 As used by Gruenberg and associates (1966).
- 92-116 (Incl.) As used by Wing and Brown (1970).

