

POWER AND UNCERTAINTY

POWER AND UNCERTAINTY: AN ANALYSIS OF THE STRUCTURE
OF AN
EMERGENCY WARD IN A GENERAL HOSPITAL

By

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SCOPE AND CONTENTS:

This study is concerned with analyzing the ways in which the members of an organization faced with problems of unpredictability and uncertainty, adapt to the situation and achieve some degree of control over it. Chapter 1 describes the organization within which the study was conducted, and also discusses the methodology employed. Chapter 2 reviews the literature pertinent to the problem, both on the spheres of organization theory and medical sociology. Chapter 3 describes the role and mode of adaptation of the physician to the situation. Chapter 4 examines the role of the head nurse and her relations with other ward members. Chapter 4 examines the role of the head nurse and her relations with other ward members. Chapter 5 provides an analysis of the sources of tension and conflict in the ward and the final chapter contains a summary of the previous arguments and a discussion of their pertinence to sociological theory.

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CHAPTER 1

BACKGROUND TO THE STUDY

CHAPTER 1

Introduction.

In this study we intend to analyze a social system that is faced with problems of uncertainty and unpredictability. As such, the system to be studied faces changes, which occur at irregular intervals but which nonetheless seriously affect the conditions under which it must operate. The unexpected, is then, a normal, rather than an unusual occurrence. The study does not intend to prove, or demonstrate conclusively, the nature of the relationship between uncertainty and social structure, but it is hoped that the conclusions reached will provide some insights which can be further developed in other studies of similar situations.

The specific problems that we have selected for analysis focus upon this aspect of uncertainty and especially upon the modes of adjustment that the participants adopt. Since most participants in social organizations perform their roles under conditions where predictability is present, either in the sense of a "world taken for granted"¹ or in settings where predictability is structured into their roles, the present analysis will attempt

¹The concept of a "World taken for granted" is here used in the sense of a stock of predictions concerning the behavior of others, which are shared by the members of a group and thought to be the only possible ways of acting in a given situation. See A. Schutz, essay on concept and theory formation in the social sciences, in M. Natanson edit. "The Philosophy of the Social Sciences", and also H. Garfinkle, "The Routine Grounds of Everyday Activities", Social Problems, vol. 11, no.3, pages 225-250.

to illustrate the ways in which the members come to terms with a reality that does not lend itself to prediction.

The unit which we have selected for study, is an emergency ward in a large general hospital which is situated in an industrial city. The ward was designed to deal with patients who were seriously ill and therefore has as its central task the problem of coping with crises. However, certain changes, which we will discuss in the second part of this chapter, have occurred which have modified the goals of the ward, so that the crisis situation has assumed a position of less prominence in ward activities. Even though these changes have taken place, the problems confronting the members of the ward still center around the lack of predictability that they have with respect to crucial aspects of their roles.

These problems can be divided into two categories: those that are relevant to the performance of the physician role, and those that confront the nursing staff. The first of these stems from two sources, 1) uncertainty arising from occupancy of the general role of physician and 2) uncertainty deriving from the pattern of role relationships on the ward. Both of these factors are important in this context since failure to provide adequate treatment may well result from them. Such failures would, in turn, result in either permanent injury or death for the patient.

The problems facing the nursing staff are related to the number of patients that make use of the ward at any time. The number of patients who may come into the ward will vary considerably from day to day and there is no way of estimating how large it will be at any time. Since there are

only a limited number of facilities that can be brought into use to cope with the patient flow, difficulties arise over how these may be distributed. Thus the nursing staff of the E. R. is confronted with the problem of accommodating fluctuating numbers of patients and of ensuring that they are seen by the physician within a minimum period of time.

Other organizations are confronted, in varying degrees, with the problem of handling changes in client turnover but in such cases, the nature of the service provided is not as critical as it is in the E. R. For example, most commercial and industrial enterprises face such fluctuations, but failure to provide the requisite service is not likely to result in permanent injury to the client or to the organization. Within the E. R. though, a failure or mistake on the part of the members is likely to have serious consequences for both the client and for the participants.²

Thus in this study we intend to examine the social structure of a hospital ward in which the participants are confronted by a situation where there is a considerable degree of uncertainty, and where also mistakes may result in the perpetrator losing his position in the organization and also his right to practice his profession in any other context.

In his essay "Mistakes at Work"³, E. C. Hughes notes that the

²One concern of the members of the E. R. is the highly public nature of much of what goes on in the ward. They feel that there has been a break down in the communications between the ward and the wider community and that as a consequence on many occasions the local news media has misrepresented them.

For this reason they feel that they will receive unfavourable publicity, which will be damaging to their careers, if they do make a mistake in the course of their work.

³See his Men and their work, The Free Press of Glencoe.

significance of making a mistake at work is not uniformly distributed throughout the various groups involved. Rather, it tends to be located in specific roles in which responsibility for the performance of the task at hand is also allocated. In much the same way, the participants in the E. R. have different responsibilities and in consequence are exposed to risks differentially. Thus the physician is responsible for the treatment of the patient, whilst the head nurse and the supervisor are responsible for the provision of facilities which enable the former to perform his task.

From this it may be hypothesized that the incumbents of these positions will develop different strategies in an attempt to control those areas of uncertainty that impinge upon them. Here we would argue that formal definitions of role obligations specify the core tasks that have to be performed by the incumbent and that where conditions intervene to make this difficult, the incumbent will adopt a form of behavior that is intended to ensure the attainment of the core task.

The Ward Setting.

In discussing the ward setting, we will examine two things. Firstly, the facilities, which includes equipment, "space" and personnel, and secondly, the typical patient's career through the ward. This second aspect will provide an orientation to the bureaucratic process in the ward and will also illustrate the extent of the patient's relations with the ward personnel.

Initially Emergency Wards were constructed to provide treatment for persons who had seriously injured themselves, or were in need of

immediate medical assistance. However, in recent years, changes have occurred which have resulted in the ward having to handle far larger numbers of patients than was originally intended. This problem is not one that is restricted to the ward under study, but appears to be present in most hospitals in industrial societies. Weirnerman and Edwards,⁴ writing in a hospital administrative journal, show that the number of patients in an emergency room that they studied, had increased 76% in the ten year period from 1953-1963. The out patient department in the same hospital had only grown by 29% in the same period.

The growth of this service is not the only change of importance to affect the ward, for changes have also occurred in types of injuries that have to be treated. In a study made in 1960, it was estimated that only 6% of the patients could be classed as "emergencies", 44% urgently in need of treatment and the remainder were cases that could have been referred to the family physician.⁵

The E. R. then, is having to adapt to a redefinition of its function which has made the word "emergency" something of a misnomer. The changes that have occurred, result primarily from three causes. Firstly, the desire of the hospital to have the physician make use of its facilities, and therefore be in attendance. Secondly, the desire of the physician to use the emergency room as a place to treat, and examine patients after hours.

⁴See "Hospitals", vol. 38, 1964.

⁵S. Lee, J. A. Solon and C. G. Sheps, "How New Patterns of Medical Care Affect the Emergency Unit", in Modern Hospitals, vol. 94, number 5, 1960.

Thirdly, the general public has come to view the emergency room as a place where they will receive prompt and efficient treatment at any time of the day or night. The first and second of these points relate specifically to the centralization of medicine, and the attendant development of new techniques involving equipment that is both intricate and costly.⁶

In the present study, the General Practitioners (G. P.s) played a significant role both in the one ward and in the hospital as a whole. The method by which they are attracted into the hospital is through the inception of reciprocal agreements, which grant to the G. P. admitting privileges in return for the referral of patients to the hospital.⁷

In addition to this arrangement, certain other reciprocal relations operate to the apparent satisfaction of both parties. Thus in return for the use of the E. R. facilities there is some pressure placed upon the physician to volunteer his services to the hospital without charge. In concrete terms this means that the G. P. may book the operating rooms in the E. R. for such minor operations as the removal of a cyst or may examine his own patients in the E. R. without charge.

⁶On this point see G. S. Tyner, in Medical Progress, January 1957.

⁷Since most community general hospitals have evolved from charitable organizations, the concept of "profit" has until recently, been absent from the vocabulary of the hospital administrator. However, since the cost of running such an establishment has grown enormously since the beginning of this century, attempts have been made to offset these increases by attracting more private patients into the hospital. As a result, the private physician has assumed a position of some importance in that he may decide not to refer his patients to one hospital and thus reduce its income. For this reason, the general hospital has been attempting to offer the private physician more attractive inducements to acquire his custom.

For a fuller account of the growth of the modern hospital see A. F. Wessen, "The Social Structure of a Modern Hospital", unpublished Ph.D. thesis, Yale 1951.

The G. P.'s obligations extend to offering his services to the hospital as a duty physician in the E. R. on one or two shifts each month.⁸ Because of the shortage of internes in the hospital, the G. P.s provide the major coverage of the emergency service and are responsible for the care of the patients in the ward for the period that they are on duty.

The physician's authority on the ward is limited to the treatment of patients. This means in effect that he occupies a position that gives him the right to diagnose and carry out treatment where he feels that it is necessary. This right ceases to be effective if he decides to call in one of the resident specialists who then takes responsibility for the patient. However, if the patient is treated by the ward physician, and is then discharged, the ward physician is responsible for the treatment prescribed.

In much the same way, the interne's legal responsibility extends to the action he takes with reference to the patient, whilst the latter is in the ward. However, in certain respects the interne's role differs from that of the duty physician.⁹ Since the interne is a "junior" member of the medical profession, and is serving a probationary term during his internship, the G.P. is expected to supervise him and also instruct him in medical practice. With the large patient load, however, this practice is not usually followed and instead both the physician and interne tend to

⁸The duty physician is assigned to one of three shifts, each time he is on duty. These extend from 10.00 A.M. to 5.00 P.M., from 5.00 P.M. to 11.00 P.M. and from 11.00 P.M. to 8.00 A.M.

⁹The interne is required to work eight hours each day on the ward, two of which are between 8.00 and 10.00 in the morning when there is no G. P. on duty.

be involved in the examination and treatment of patients independently. Only on those occasions when the interne is confronted by a lack of knowledge with respect to the causes of a patient's condition, does he tend to seek the assistance of the duty physician.

The nursing group constitutes the "line" aspect of the ward authority structure. The line of authority extends from the supervisor to the head nurse, who is the key administrative figure in the running of the ward. The supervisor's responsibilities are mainly administrative and involve four components. 1) The provision of supplies. 2) The allocation of nursing personnel to the various shifts. 3) The supervision of the nurses and the enforcement of hospital rules applying to the ward. 4) The training of new ward personnel and the giving of assistance where this is needed.

The head nurse's primary task is the coordination of the nursing staff during the day and evening shifts. This involves the assignment of nurses to particular duties as the need arises and the supervision of these to ensure that the physician's orders are properly carried out. A second element is that of the collection of information pertaining to ward activities. Because of her central position in the ward, the head nurse is also concerned with the allocation of patients to the various rooms and with making certain that they are examined by the physician.

The graduate and student nurses perform much the same work on the ward and differ from the nursing assistants in so far as they are allowed to assist physicians in the surgeries and also give injections.¹⁰

¹⁰During the night shift, which lasts from 11.00 P.M. to 7.00 A.M., only graduate nurses are on duty. On both of the other shifts at least one representative of the various groups are present in the ward.

The two remaining groups, the ward clerks and the orderlies, perform non-medical roles in that they are not directly concerned with the treatment of the patients. The clerks perform routine administrative tasks related to the collection and transmission of information. In one sense they constitute an important link between the ward and other departments within the hospital, since they have to relay requests coming from the nursing staff to other units and also pass on information coming into the ward.

The orderlies perform most of the manual tasks in the ward, such as lifting and transporting patients both within, the E. R., and between it and other wards. Their other duties include the dressing and undressing of patients, moving items of ward equipment and making beds.

The physical and technological aspects of the ward are also of some importance in that these to some extent determine the number of patients that can be examined at any time. For example, the number of surgeries limits the length of time that a patient who is in need of suturing, will remain on the ward. Similarly, the type of equipment may reduce the length of the patient's stay in the ward.

Under normal circumstances the ward has bed space for eight patients which in effect means that only eight people may be examined privately at any time. Besides these rooms there are two other treatment rooms. The first of these is quite large and can hold about twenty people who sit on chairs lining the walls. The other has space enough for about three people at the most, and has a curtain over the entrance to protect those inside from the gaze of other patients passing along the corridor.

Besides these the ward is equipped with three surgeries, two of

which are used for minor operations or for casualty cases where there is a limited amount of injury. The third is a fully equipped operating theatre which is usually kept for cases where emergency surgery is necessary. People who have been involved in serious accidents are usually taken straight into this room and given immediate treatment by whichever physician is available at the time.

Certain other items of equipment though, do not come under the control of the ward personnel. For example, two of the crucial forms of medical test have to be conducted outside of the ward and in consequence administrative control over these lies outside the E. R. Thus the majority of x-rays are performed and read within the x-ray department and as a result the E. R. is dependent upon it for this crucial service. In the x-ray department, as in the laboratories, the speed at which tests can be completed very much depends upon the speed at which the various machines work.

In other respects the ward is self sufficient and is in a position to provide assistance without having to call in other departments. Thus for example, it is a Poison Control Center and is equipped with a full range of antidotes for most types of poison. Similarly, it is prepared for dealing with cardiac arrest cases.

The Patient's Career.

When the patient enters the ward, he either walks, or is wheeled or carried, from the main doors to the desk at the nurse's station, where he will be asked by the head nurse or by any of the ward staff, with the exception of the orderly, the nature of his injury. On receipt of this

information the head nurse will assign him to one of the rooms, depending on the extent, visibility or "unpleasantness"¹¹ of the complaint. For example, someone with a badly lacerated head will be placed in one of the side rooms where he will be out of sight of the other patients. As one of the head nurses explained, "It's not very pleasant for the other patients if they have to sit next to someone who is dripping blood all over the place".

To a large extent, the patient is placed in a room on the basis of his illness or injury, so that ecologically, there is a high degree of differentiation. This provides one form of standardization on the ward in that equipment is allocated to various rooms on a permanent basis which means that patients are assigned with reference to the location of the equipment necessary for their treatment.¹²

Once the head nurse has decided where to place the patient, she will ask a nurse to escort him there and get his "particulars". The nurse will take out one of the records from a rack on one of the side tables and take the patient into the specified room where she will ask the person a number of questions pertaining to his work, family, religion, previous hospitalization, and the nature of his complaint. The information is

¹¹Those patients who are likely to interfere in the running of the ward in any way are usually placed in the small office, and thus are effectively segregated from the other patients. This group is mainly composed of alcoholics who are brought in by the police.

¹²For an interesting analysis of the ecology of a hospital ward see R. Rosengren and S. DeVault, "The Sociology of Time and Space in an Obstetrical Hospital", in Friedson edit. The Hospital In Modern Society, Free Press of Glencoe, 1963.

recorded on the chart, with the information on his illness being stated in a standard form, "The patient states that he fell and cut his arm", and then the nurse proceeds to perform some first aid where this is seen to be necessary. This last action may be of limited medical value in many cases, but it is felt to be an important mode of control by the nurses. On one occasion a student nurse was admonished by the head nurse for not having given a patient any medical attention after taking the record. The sanction was framed, not in terms of any benefits that such an action would have for the patient's health, but rather with reference to the psychological consequences for the patient.¹³

The nurse then returns to the desk and puts the record in a board which is fixed to the wall opposite the desk. This item is designed to show at a glance where each of the patients is, and what stage of his treatment he has reached. The various categories, or headings, specify which of them is waiting to be seen by the physician, is being seen, is being treated, is waiting for results, etc. Each chart has written on it the time at which the patient arrived in the ward and these are put into the appropriate slot in order of the time of their arrival.

Depending upon whether the patient wishes to be treated by the

¹³The head nurse's words were, "Well next time you see someone with a laceration, try and do some thing for the patient, like bathing his finger or changing his dressing. It looks as though you are more interested in the record than in the patient's welfare, so try and do something however small, to make it look as though you care". The rationale for the action is framed then, in terms of "putting the patient at ease", so that he does not make excessive demands on the nursing staff.

ward physicians or not,¹⁴ he will be examined by a doctor who will specify the course of action that he wishes to follow. Thus he may decide on one of three lines of action, depending upon the patient's state of health. Firstly, if he thinks that the patient is in need of hospitalization, he will ask for the resident in the appropriate service to examine the person. Secondly, he may treat the patient on the ward and then allow him to be discharged and thirdly, he may discharge the patient without giving any treatment.

At each of these stages the physician has to fill in on the record the diagnosis, symptoms, and the treatment provided. Further, nurses who carry out any treatment ordered by the doctor, have to enter this on the chart and have it countersigned by the physician.

Similarly, if tests are required, requisitions have to be completed and given to the relevant department. When the results of these become available, they are appended to the record and replaced on the board.

If the patient is discharged, one part of the record is given to him and this is taken to the Admitting Department, where arrangements are made for the payment of the bill. The remaining sheets are retained by the physician and the hospital, the latter constituting part of a file of

¹⁴The patient has the choice, on entering the ward, of having his own private doctor examine and treat him, or of having the ward physician look at him. If he chooses the first of these courses, the doctor is contacted and if he has not arrived within thirty minutes, the patient may either choose to wait until he does so, or have the duty physician treat him.

In cases where the patient does not have a family doctor he is presented with a list of the physicians in the locality and asked to select one. The procedure that follows is essentially that outlined above.

"old charts" which are made available to the various wards in the hospital on demand.¹⁵

Thus in his movement through the ward the patient is likely to come into only brief contact with the medical staff. He will most probably view himself, and be viewed by the staff, as being a "transient" who will not remain in the ward for any great length of time. From the point of view of the nursing staff the patient is likely to be a "nuisance" if he constitutes one of the estimated 20% who enter the ward and "have had pains for two months before and expect immediate treatment". But if he is one of the estimated 20% who are real emergency cases he will get prompt and efficient assistance.¹⁶

Unlike other hospital wards, the Emergency room has no long term patients, who have the opportunity to develop relations with either physicians or the nursing staff. As such it provides a context from the nursing staff's perspective, in which involvement with the patients is not valued.

Methodology.

Over a period of three and a half months the writer was present on the ward as a non-participant observer, and in this capacity he was given

¹⁵The record is made of four identical sheets, each a different colour. One of these goes to the accounts department, one to the doctor that treated the patient, one for the construction of "old Charts" and the fourth, a yellow sheet, is released to newspaper reporters, if this is thought to be necessary.

¹⁶These percentages are estimates made by one of the head nurses. One of the problems which we will discuss in a later chapter revolves around the nurses' behavior toward these different categories of patients.

access to policy manuals and other formal directives sent to the ward.

The primary method of collecting information for the study was that of observation, and as a non-participant in the ward he was given full cooperation by the supervisors and other members of the ward staff who allowed him to follow them around and watch them at their work. Similar consideration was shown by several of the physicians who also permitted the writer to accompany them on their ward rounds.

In the course of collecting the relevant material, the writer attempted to avoid becoming an active participant in the ward, even though this might have provided him with more complete evidence in certain areas. The only formal role that he could have taken in the ward would have been that of porter, which, because of its peripheral location in the interaction system, would have meant that his opportunities to observe would have been quite restricted.

The observation period was roughly divided into two equal portions, half of which was spent accompanying the physicians and the remainder at the nurse's station. From this vantage point, the observer was in a position to watch and listen to interaction between the nursing and ward medical staff. Since the head nurse was situated at the nurse's station this was the focal region in the ward for administrative and medical decision making.

Field notes were not taken directly, but points that were thought to be significant were jotted down in point form and written up more fully at the end of the day. This was thought to be the more suitable approach since it enabled the writer to remain fairly unobtrusive, and since in

some situations note taking was impracticable.

Another source of data was collected by recording interactions between the participants for periods of up to three hours . This procedure involved noting who initiated and who received interaction and the classification of these in terms of whether these were primarily instrumental or expressive in content. The collection of this type of information was designed to enable the writer to test hypotheses concerning the significance of the various participants in the E. R. and also to make descriptive statements about ward activities.¹⁷

During the observation period the writer was confronted with one problem which had not been anticipated at the start of the study. At frequent intervals attempts were made by members of the ward staff to provide the writer with a role that was meaningful to them. Since the observer spent periods of up to eight hours on the ward at a time his presence could not have gone unnoticed by either nurses or physicians.

¹⁷By an instrumental interaction we mean any action which has as its purpose the achievement of a ward goal. Expressive actions are those which have as their purpose the communication of sentiments.

Thus any action may be classified as either instrumental or expressive depending upon its content. This simple distinction perhaps conceals the difficulties that become apparent once it is applied to an empirical situation. Firstly, it involved some degree of understanding on the part of the observer in that before a decision can be made with regard to the content of, for example, a conversation, the observer must be in a position to grasp the shared meanings that are contained within it. In order to avoid this difficulty, the writer did not attempt any such classification of interactions until he had familiarized himself with the ward setting and the roles of the participants.

A second problem involved in the use of this method lies in the fact that any one action may contain components which are both instrumental and expressive in meaning. To overcome this difficulty the writer chose to classify cases as separate interactions. Thus a remark such as "have you sent up for those x-ray results yet? They must be hiding them up there", would be entered as both an instrumental and an expressive interaction.

After about one month, the writer was asked if he would like to help out by performing certain minor tasks. For example, he was asked to fill out x-ray reports, answer phone calls and make coffee.

To have accepted all these attempts at role definition would have resulted in a deflection of the observer's attention away from his primary interest, to the task at hand. However, by not accepting these attempts, the observer risked losing the support of the various groups in the ward. Since this study was not sponsored by the hospital in question, the writer's position there was somewhat tenuous, so that his right to remain in the ward rested with the members. Faced with this situation, the writer chose a compromise path, which enabled him to continue with the observation whilst performing a minimal task in the ward. The task chosen was that of making the coffee for the physicians which took up only a few minutes out of each day. It is significant that by the end of the observation period the writer was known as "our coffee maker", and that mild sanctions were applied whenever he failed to fulfill the obligations attached to this role.

Chapter Outline.

In this chapter we have discussed the aims of the study and have briefly described the ward setting in which it took place and the research methods used. Chapter 2 will contain an examination of the literature in the fields of formal organizations and medical sociology to discover the ways in which they have dealt with the problems raised here.

Chapter 3 will involve an examination of the physician's role and the typical behavior patterns associated with it. Chapter 4 will repeat this approach, only taking as its focus the role of the head nurse in the

ward.

The sixth chapter will present an analysis of the causes of tension and conflict in the E. R. and will attempt to show how these are related to the strategies employed by the head nurse and the physician.

The fifth and final chapter will summarize the arguments presented in the previous chapters and examine the extent to which they fit under the theoretical frameworks outlined in the second chapter.

CHAPTER 2

UNCERTAINTY AND FORMAL ORGANIZATION

CHAPTER 2

In this study we intend to analyze the relationship of uncertainty to the structure of a social organization. The organization, the E. R., is itself part of a larger system which constitutes its immediate environment and which is able to determine to a very large extent the formal conditions under which it may operate. Thus, in this study we will be taking this wider system for granted, and will not attempt to explain the relations between it and the ward. What we will examine will be the relationship between the formal rules which apply to the ward and the conditions of unpredictability that prevail.

Since the major contribution to organization theory has come from Max Weber,¹ it is necessary to examine some of the assumptions that he made in his analyses of bureaucratic organization. Firstly, it must be remembered that Weber was interested in bureaucracy only insofar as it could be seen as an emergent phenomenon within western societies, where the dominant value pattern is that of rationality.² Bureaucracy, he sees

¹Statements of Weber's theory may be found in his Theory of Social and Economic Organization. Free Press of Glencoe, Collier MacMillan Ltd., London, 1964. See also, From Max Weber: Essays in Sociology, edit.H. Gerth and C. W. Mills, Routledge and Kegan Paul, 1961.

²On this point see R. Bendix, Max Weber: An Intellectual Portrait. Doubleday and Company Inc., Garden City, New York, 1962, passim.

as a key institution in industrial societies, which is largely responsible for the transformation of social relationships into a primarily "gesellschaft" type in which action is based upon wholly impersonal criteria. However, the relationship is not wholly one sided. Rather, it is one of functional interdependence, in which resources necessary for the operation of bureaucracy are contributed by the society, in return for such factors as reliability of performance, efficiency and universality. The reason for the prominence of this type of organization in industrial society, lies in the consequences of its structure for social action.

Perhaps the most important of these consequences is the increased possibility of calculability that it provides over other modes of organization. To the extent that it stabilizes social relations by preventing the arbitrary intervention of personal interests in the sphere of routine activities, bureaucracy functions to make these activities highly predictable. Thus there is an increase in the possibility of attaining a high degree of calculability, by imposing a set of uniform rules on the relations between the organization and its clients, and on those within the bureaucracy.³

For Weber then, bureaucracy functions to make certain the ways in which persons will behave, and thus makes possible the prediction of events

³M. Weber, op.cit., pp.337-341. It is interesting to note that certain writers tend to take, as Weber's characteristics of bureaucratic organization, certain of its consequences. Thus P. Blau includes in his list "impersonality" and "efficiency", however, these are not structural elements of the ideal type as Weber developed it, but rather features that result from its operation. See P. Blau, Bureaucracy in Modern Society. Random House, New York, 1962, pp.30-32, and also M. Weber, ibid, p.340.

which are significant to the organization. For the most part predictability is one component of organizational behavior, in that adherence to the rules ensures some degree of regularity. However, as students of complex bureaucratic organizations have suggested, conformity to the rules is by no means to be taken for granted. The studies of Mayo, and Roethlisberger and Dickson⁴ have made it evident that the avoidance of formal rules may become an institutionalized pattern in work groups, and that alternative technical and moral norms and standards may be set up to challenge the official model. This would imply that uncertainty can be created under conditions where rules are not adhered to. For if conformity provides the basis for prediction, then deviance from the rules will prevent it.

The question of conformity in bureaucracies is problematic, and is not something that may be assumed. As Gouldner argues, Weber takes for granted the fact that the rules will have a common meaning to all the participants, and that further they will have a common utility.⁵ The members of bureaucracies are not homogeneous in terms of their normative orientations, in fact the formal structure may create differences which

⁴E. Mayo, The Social Problems of an Industrial Society. Division of Research, Graduate School of Business Administration, Harvard University, 1945. F. J. Roethlisberger and W. J. Dickson, Management and the Worker. Harvard University Press, Cambridge, Massachusetts, 1939.

⁵See his essay, "On Weber's Analysis of Bureaucratic Rules", in R. K. Merton edit., Reader in Bureaucracy. The Free Press, 1962, pp.48-51.

lead to the development of conflicting ideologies and interests.⁶ But it may be seen also, that rules may have latent as well as manifest functions, and it is on this latter category that Weber concentrates. Thus, for example, the application of bureaucratic rules may result in a reduction in the number of direct orders transmitted through the chain of command, and in turn reduce the degree of arbitrary interference in the sphere of authority, from those in higher positions. As such, it may have tension reducing functions. However the point to note here, is that the unintended consequences of bureaucratic rules may alter the situation to some extent, and thus introduce an element of indeterminacy into the organization.

Gouldner has made a careful examination of the functions of rules in complex organizations and suggests that these cannot be treated in terms of their formal purpose alone.⁷ Rather their consequences for the various strata in the organization must be explicated. He goes on to suggest that three types of bureaucracy can be distinguished on the basis of the degree of consensus that exists between the groups in the organization. The first of these is "representative bureaucracy" in which all groups involved in the organization, initiate the inception of new rules,

⁶R. Dahrendorf for example has attempted to develop a theory of conflict based on the premise that the interests of groups differ in terms of their relations to the system of authority. Each position in an organization has a latent interest, which stems from its relation to the authority structure. Thus, whilst the rules may be uniform for all the members, differences will arise between them as a result of their latent interests. See R. Dahrendorf, Class and Class Conflict in Industrial Society.

⁷A. Gouldner, The Patterns of Industrial Bureaucracy. The Free Press of Glencoe, 1964, chapter 9, pp.162-176.

which are legitimated in terms of their own values. Enforcement of these rules is thought to be necessary, and deviance, where it occurs, is defined as resulting from ignorance on the part of the offender. Conformity, in this type of situation, results in the appreciation of the participant's status, whilst deviance leads to a reduction in status which is recognized by all concerned.⁸

The second type is that of "punishment centered" bureaucracy, which is characterized by the imposition of rules by one party alone. Deviance under these circumstances is defined by the superordinate group as being wilful and deliberate, and results in a status gain only from the perspective of the one group. Thus by breaking a rule, the participant would receive a reward, in the form of prestige, from the members who opposed the imposition of the rule.

The third type that he distinguishes is termed "mock" bureaucracy. In this, the main component is the consensus between the parties to ignore the formal rules, which have been imposed by an outside authority. Here, deviance is encouraged and results in a prestige gain for the actor who is involved. In this case, deviance is thought to result, by the participants, from an "uncontrollable need", or "human nature".

Since each of these is an analytical type, they may all be found in a single empirical situation, unlike Weber's model which is ideal

⁸A. Gouldner, *ibid.*, pp.181-284.

typical in form.⁹ Thus we might expect to find in the organization under analysis elements of all three.

Other writers, taking their initial problem from Weber, have noted that the model outlined by him, may well have consequences other than those he suggested. Thus Merton has shown how the same set of conditions may give rise to an empirical pattern in which rigidity and "ritualism" constitute the major features.¹⁰ Merton suggests that such organizations function to produce what Selznick has elsewhere termed "a displacement of goals",¹¹ in which the rules become ends in themselves, rather than means. Merton's hypothesis has been tested by Francis and Stone, who make the distinction between service and procedural orientations.¹² By a service orientation, they mean an attention to the needs of the client, as opposed to a procedural orientation, which refers

⁹Several writers have questioned the utility of the ideal type as a sociological method. See for example, P. Blau, op.cit., 34-36, and S. Udy, "Bureaucracy and Rationality in Weber's Organization Theory", American Sociological Review, 24 (1959), pp.791-795.

¹⁰See his essay "Bureaucratic Structure and Personality", in Social Theory and Social Structure, Free Press of Glencoe, 1964, chapter 6. For a re-formulation of this see March and Simon, Organizations, John Wiley and Sons Inc., 1958, chapter 3. In this the authors present Merton's and Gouldner's theories in diagrammatic form.

¹¹P. Selznick, in his work, T. V.A. and the Grass Roots, University of California Press, Berkeley & Los Angeles, California, 1953, examines the relationship between the social environment of a complex organization, and its internal structure. One of his main theoretical conclusions is that in order to protect itself against external threats and opposition, the staff of the organization may employ the mechanism whereby members of the hostile group are coopted. However, this tends to lead to a deflection of the organizational goals, since compromises have to be made with this group who now share power with the original members.

¹²R. G. Francis and R.C. Stone, Service and Procedure in Bureaucracy, Minneapolis: University of Minnesota Press, 1956.

to a tendency on the part of officials to abide by the rules, at the expense of achieving the goals for which they were established. This latter concept is Merton's "ritualism". In their study they concluded that both types of orientation could be found in the same organizational context, and that deviation from the rules is likely to occur if it results in the achievement of a particular goal. . . . A procedural orientation is likely to be present where

skills required of personnel are at a minimum and where it is possible to substitute forms or records for clients.¹³

This finding can be seen to rest upon two conditions, the level of skills required of officials, and the degree to which a series of operations or activities, can be standardized and thus formulated in terms of a set of abstract rules. It would also indicate that in areas where there is uncertainty, and where in consequence discretion in the application of knowledge to the situation is the only real possibility, bureaucratic rules may be waived by officials if they are skilled enough. This, they develop into an hypothesis concerning the power of groups in organizations. Thus where the power and influence of a professional group is high, the members will tend to subordinate the rules and formal procedures to fit their interests.¹⁴

¹³Francis and Stone, *ibid.*, pp.158-159.

¹⁴Francis and Stone, *ibid.*, p. 163. It may be seen that one feature of professional groups is that they have the power to prevent non-members from acquiring, and applying the special corpus of knowledge that they monopolize. This has two functions. Firstly it prevents outsiders from misusing the information, so as to cause difficulties to clients, and to endanger the reputation of the profession. Secondly, and equally important, it ensures that this knowledge will not be rationalized and formulated into impersonal

Thus, Francis and Stone argue that professional groups often subordinate the formal rules, to their own interests, but this is not always the case as Merton has shown.¹⁵ He argues that the professional in bureaucracies is often subordinated to officials, who have a considerable interest in ensuring that the information that the specialist is employed to provide, is made available by a given time. Pressures of this type are likely to produce conflict, except where the professional group is in a position to control a crucial area of the organization. Moore has made a similar point when he has shown that professionals employed in organizations are often forced to make decisions on inadequate grounds, because of the need to meet deadlines set by officials. This leads to what he terms "decisional urgency",¹⁶ in which the expert is forced to reach decisions under conditions he does not accept. To some extent then, professionals may find that their authority is limited and that the conditions in which they work do not meet their ideal standards.

It is necessary now to attempt to specify the conditions under

¹⁴cont'd. rules. If this latter process were to occur, the profession would lose, not only its prestige, but also its power in the market. See on this M. Crozier, The Bureaucratic Phenomenon, University of Chicago Press, 1964, esp. footnote on page 165.

¹⁵R. K. Merton, "The Role of the Intellectual in Public Bureaucracy" in his Social Theory and Social Structure, op. cit. chapter 8.

¹⁶W. E. Moore, Man Time and Society, John Wiley and Sons Inc., London and New York, 1963, chapter 5, esp. pp.100-102. M. Dalton has examined the relations between specialists and "line" authority officers, and has shown how certain tensions existing between them are endemic to the "line and Staff" type of organization. See his essay in A. Etzioni, Complex Organizations: A Sociological Reader, New York, Holt, Rinehart and Winston, 1961.

which groups in organizations acquire power, since the possession of this attribute is, as we have seen, an important factor in understanding the relationship of roles to formal rules. One of the most theoretically useful conceptual schemes for the analysis of the emergence of power, as opposed to authority, in complex organizations, has been advanced by Mechanic.¹⁷ He sets forward a series of propositions concerning the likelihood of a group of acquiring power in a bureaucracy, and among these is the postulate that "organizational power is related to access to persons, information and instrumentalities". While this indicates that information and access to persons is important, it does not fully explain why this should be so. Indeed, these are necessary requisites for the operation of bureaucracies, and formal rules exist to specify the extent to which persons may possess this right. However in two further propositions he goes on to suggest which members of the organization will be likely to be in these positions. The first of these suggests that lower participants who have expert knowledge not available to higher ranking personnel, will have power over them, and the second that persons who are difficult to replace will also be in a similar position.¹⁸

¹⁷D. Mechanic, essay entitled "Sources of Power of Lower Participants in Complex Organizations" in New Perspectives in Organization Research, edited by W.W.Cooper, H.J.Leavitt and M.W.Shelly, John Wiley and Sons, Inc., 1964, chapter 9, pp.136-149.

¹⁸Certain of Mechanic's propositions have been excluded here since these are of a psychological character. For example, he suggests that personality is a further source of power in that, "people who are attractive are more likely to obtain access to persons, and once access is gained, they may be more likely to succeed in promoting a cause". Mechanic, op.cit., pp.145-146.

Mechanic goes on to argue that the factor common to these propositions is that of dependence. Models of complex organizations often take for granted the presence of a high degree of interdependence, and this idea is implicit in the concepts of "division of labour" and "role specialization". However, as Mechanic suggests, relationships vary in the extent to which there is interdependence, and certain groups may be placed in situations where they are totally dependent on other participants. Where this occurs, the relations between them are likely to be characterized by an element of exploitation, or of "blackmail".¹⁹

For Crozier,²⁰ the central variable in his theory is uncertainty, that is the inability to predict events that are important to the achievement of the organizational goal. Uncertainty derives its importance from the fact that in systems where there is interdependence, each participant has the possibility of preventing others from attaining their goals. Where the actor is in a position to do this without suffering in return

¹⁹Time is also crucial to this process, in that as the time for the completion of some valued aim or goal draws closer, so the power of the exploiting group becomes greater. For example, in industry, strikes are more likely to be effective, if they are timed close to the final date for the completion of an order. With the shortage of time available to management in such a situation, the value of alternative courses of action, other than capitulation, declines.

With reference to the concept of blackmail, it must be pointed out that it differs from other types of power, since its effectiveness rests upon the ability of the holder to refrain from applying the sanction. Once a blackmailer has revealed to the wider society the nature of the threat he held over his victim, he no longer possesses any power. Blackmail, can then, only involve the use of sanctions once, while other types of power are not dissipated by the application of the sanction.

²⁰M. Crozier, op.cit., chapter 6.

the loss of some valued resource, then he may be said to have power. By creating or exploiting an existing area of uncertainty, a person or group, is able to make others comply with his or their own demands.

If the basis of power is uncertainty, then it is possible to conceptualize a situation in which lower participants are able to modify their work situation, by creating some indeterminacy in their relations with others. Some groupings are likely to be in such a power situation as a result of their special knowledge, as Mechanic suggests, which gives them control over an area of some importance to others. Thus a "natural" sphere of uncertainty, which is important to the achievement of organizational goals, creates the need for control, since unpredictability disrupts the coordination of activities which is essential to the running of a complex bureaucratic organization.²¹ Groups attempt to protect and preserve their own area of discretion against rationalization, since if their power can be replaced by formal rules, it will be lost. Thus groups, may conceal the "tricks of their trade" both to ensure that they are not misused, but also to prevent their power from being reduced to a set of rules, which would require less trained personnel to implement them. This is the position of the specialist, who retains his bargaining position in an organization by concealing the knowledge or information that enables him to control an area of uncertainty.

However uncertainty can also be created out of the formal structure. As Crozier notes, complete adherence constitutes one means by which a

²¹See on this point, W. E. Moore, op. cit., chapters 5 and 8.

group demonstrates that its support is not something to be taken for granted. Thus by showing that the formal system is not as efficient as it is intended to be, a group, may show that its participation is more important than the official model assumes. Crozier examines Roy's analysis of the practice of "making out" in work organizations, by showing how this process is one means that the workers have of demonstrating that they have more discretion than is thought to be the case.²² "Making out" involves working at a very fast pace for a period of time and then taking things easy, since the same amount of pay has been accumulated in this time, as would be possible by working at a slower pace continuously. Whilst this practice appears on the surface to be highly irrational, Crozier argues that it is designed to show that the worker's knowledge is greater than that of management in respect to the task being performed, and that this knowledge is something that has to be bargained for.

Power, then, derives from a group's control over an area of uncertainty, which itself may be either a "natural" area, as in mechanical failures, or one that is created by the participants, who show that even within the framework of the formal rules, a residue of uncertainty exists around the motivation of the personnel.^{22a} However, it is not enough to state that power is important in complex organizations, since the danger always exists that this will be taken as the only variable of importance

²²M. Crozier, op.cit., pp.161-162. See also D. Roy, "Work Satisfaction and Social Rewards in Quota Achievement", *American Sociological Review*, vol.18, (1953), pp.507-514.

^{22a} Following Weber, we will define power as, "the probability that one actor within a social relationship will be in a position to carry out his own will despite resistance, regardless of the basis on which this probability exists. See M. Weber, op.cit., 152.

in explaining social relations.²³ Thus, some mechanisms must exist in the organization to prevent the pattern of social relations from becoming completely disrupted by the competition and conflict between groups who have power, and who are bargaining for a larger reward. Crozier outlines four such mechanisms. The first of these is "the necessity of the members of the different groups to live together". He argues that since the competing groups have to work in the same milieu for protracted periods of time, their members are likely to attempt to create some elements of harmony, to prevent this one segment of their lives from becoming intolerable. By utilizing wider cultural norms, participants are able to define the limits of conflict and can successfully block the demands of other groups by invoking these norms which are shared by all.

The second mechanism is that of the awareness of the members that to some extent their privileges rest upon interdependence. Thus whilst a group may be in a very strong position with respect to others, it may not press its advantage too strongly, since by doing this it might disrupt the status quo. If the relationships became too exploitative, there might be considerable pressure created for change, which would destroy the basis of the group's power, and thus its advantages. To some extent,

²³The early "human relations" writers, in a reaction to the deterministic arguments of the "mechanistic" theorists, who proposed that behavior could be understood solely in terms of rational motivation, placed themselves in an extreme position in an attempt to show the importance of sentiment and non-rational elements. Thus S. Chase took the position that, "the worker is driven by a desperate inner urge to find an environment where he can take root, where he belongs and has a function". Such writers tended to forget that most men have to work to eat, and that the world view of the "Protestant Ethic" may not be embraced as idealistically by the contemporary lower classes, as it is by academics. It is worth noting also that one of

a power group, within an organization, must not push its claims too far, but must rather support other groups, which it is in a position to exploit.

The third of these integrative mechanisms, is that of shared conceptions of what a "fair days work" constitutes. Common to the members of the organization is the idea of what the appropriate level of efficiency should be, and this is enforced by all members regardless of their group affiliations. This provided a norm that lower participants could apply to those who were in a position to exploit them, and thus check their power.²⁴

The fourth mechanism cited by Crozier, is that which arises from the fact that if the situation were exploited to the full by those with power, attempts will be made to rationalize their power. That is, new rules will be introduced to reduce the amount of discretion available to the group, which would then be in a weaker bargaining position. Thus, a further motivation to support the status quo results from the threat of further rationalization.²⁵

²³ cont'd. the foremost proponents of this approach, W. F. Whyte, has recently "re-discovered" the importance of financial inducements to work. See his Money and Motivation, New York: Harper, 1955.

²⁴ We suggest that the presence of this norm or tacit agreement in an organization, is not necessarily universal. Thus it may be found that conceptions of what a "fair days work" should be, differ considerably from group to group. In fact, one way of viewing the history of the Trade Union movement would be to examine the process by which this concept was employed by labour leaders as a means of changing the work situation. See Gouldner, Patterns of Industrial Bureaucracy, ibid., chapter 8, for a discussion of the ways in which groups differ in this respect.

²⁵ See on this point Crozier, op. cit., pp.165-170. In this study we shall use the concept of uncertainty to apply to two types of situation. Firstly, we shall use it to refer to situations in which the possibility of predicting events of significance to the organization is negligible. Thus, for example, with respect to client flow, the number of patients who will come into the ward at any one time cannot be estimated before hand. Secondly we will use it to cover those situations in which the performance of role

From this brief review of the literature on power and formal rules in bureaucracies we may now suggest several general hypotheses pertinent to our own study.

1. Firstly, where a group or role incumbent is in a position to control an area of uncertainty that is important to other groups, then it is likely to have power over them.
2. Secondly, where a group or role incumbent possesses power, it will be able to evade formal rules, where this is to its advantage. The corollary to this would be that where groups do not have power, but are subordinated to other groups that do, then it will engage in some form of "ritualism" as a means of limiting the demands of the exploiting group.
3. Thirdly, where a group is in a position in which it has power, it will resist attempts at rationalization, while subordinate groups will be interested in introducing new rules to check the power of these others.
4. Fourthly, the smaller the extent to which elements of "mock" and "representative" bureaucracy are present in the situation, the more open will be the conflict between groups.
5. Fifthly, where groups introduce rules, with the specific intention of reducing the power of some other group, then it is likely that a form of "punishment centered" bureaucracy will emerge.

We will now turn to the literature on medical organization, and examine some of the findings that are pertinent to our own study. To the extent that we are interested in the relationships between groups within a bureaucratic setting, the works we will select for discussion will be those pertaining to this area.

25. (cont'd) expectations by actors, cannot be depended on by others. Thus in cases where the passage of crucial information to an actor depends upon persons whose cooperation is not guaranteed, we will talk of uncertainty. Here uncertainty resides, not in the impossibility of prediction, but rather in the relations between actors. Where cooperation and support cannot be taken for granted, then we will refer to uncertainty in its second usage.

Medical Sociology

R. L. Coser²⁶ in a comparative study of a medical and a surgical ward, found that the extent to which authority was centralized in each of these depended upon the amount of time that was available in which decisions could be reached. In the surgical ward, decisions had to be made within a short space of time, and in consequence consultation between physicians was bypassed as a method for doing this, and instead the right to decide rested with the chief resident. On the medical ward, time was less crucial, and decisions concerning patients were made at meetings at which all the medical staff were present. This had consequences for other ward members who stood at the foot of the hierarchy and who tended to resist the authority of the physicians by employing a form of ritualism. On the surgical ward, since the junior physicians and nurses all occupied much the same position with respect to the right to make decisions, they tended to have strong informal bonds. The head nurse in this setting was able to use considerable discretion with regard to the patient because conflicting orders were directed to her by all the staff, who were not assigned specific patients to take care of.

In a second study, Coser applied Merton's paradigm²⁷ for the analysis of deviant behavior to a hospital for incurable patients. Here, her problem was related to the consequences for action, of a situation

²⁶R. L. Coser, "Authority and Decision Making in a Hospital", *American Sociological Review*, vol.23, 1958.

²⁷Merton, op.cit., chapter 5.

where achievement of an institutionalized goal was not possible. Thus, the goal of "restoring patients to health" was, by definition, not attainable, and the nursing staff viewed their job as one revolving around keeping the wards clean and tidy. Relations with physicians were characterized by avoidance norms, which specified that participants should minimize the demands they made on one another.²⁸

Seeman and Evans,²⁹ in an investigation of the relationship between the role performance of internes, and the type of stratification system found on different hospital wards, found that the lower the degree of stratification, the higher the performance of the interne. In another article they related the interne's attitudes towards hospital stratification to the stage he had reached in his career.³⁰ At the start of his internship, the interne tends to hold to the idea that the team approach to medicine³¹ is the best form of organization, and that relationships between himself, other physicians and nurses should be egalitarian. By the time he reached the end of his internship however, he favoured a much greater degree of status differentiation between physicians and

²⁸R. L. Coser, "Alienation and Social Structure" in E. Friedson edit. The Hospital in Modern Society, Glencoe Free Press, 1963.

²⁹M. Seeman and J. Evans, "Stratification and Hospital Care: The Performance of the Medical Intern", American Sociological Review, vol. 26, 1961.

³⁰M. Seeman and J. Evans, "Apprenticeship and Attitude Change", American Journal of Sociology, vol. 67, 1962, pp.365-378.

³¹The Team Approach involves joint participation in decision making by physicians and nursing staff.

nurses, and also closer relations between internes and other physicians.

In a descriptive study of a large hospital, A. F. Wessen indicates that stratification is an important variable which influences the functioning of the system as a whole. Hierarchical prestige differences were evidenced in a variety of ways including dress, and seating arrangements in the staff canteen. These differences between role groups resembled a caste system, whose barriers prevented the transmission of information. This problem was exaggerated by the fact that the different training each group received, provided them with languages that were incomprehensible to other groups in the hospital.³²

R. Wilson's³³ analysis of the pattern of social relationships in the operating room, (O.R.), notes that one of the central features of the system is the regular emergence of tension and conflict. Because of the nature of the work that is performed in the O.R., and because of the centralization of authority in the hands of the surgeon, responsibility rests with one actor, who is in consequence placed under considerable stress. One general pattern that emerges to relieve the tension, is that of joking. Thus the situation tended to alternate between hostility,

³²The Social Structure of a Modern Hospital, unpublished Ph.D thesis, Yale University, 1951. For a brief summary of his findings see his article, "Hospital Ideology and Communication between Ward Personnel", in E. G. Jaco, (ed.) Patients, Physicians and Illness, Glencoe Free Press, 1958.

³³"Teamwork in the Operating Room" in Burling and Lentz, The Give and Take in Hospitals, G. P. Putnam and Sons, New York, 1956. See also on this E. Goffman "Role Distance" in his work, Encounters, Bobbs Merrill Inc., 1963, pp.115-132.

openly expressed, and joking which functioned to offset the threat presented to the motivation of the participants.

In discussions of the physician's role, most writers suggest that this role is characterized by the degree of uncertainty facing the incumbent. The most lucid analysis of this is made by Fox,³⁴ who argues that three types of uncertainty can be discerned with which the physician is generally confronted. The first of these results from the specialization of medical training, which results in the practitioner only possessing a small percentage of the total knowledge available. This creates a problem in that the physician is often not able to diagnose a patient's complaint because he lacks the knowledge pertinent to this area. Secondly, uncertainty results from the fact that in many respects medical theory is not able to provide answers to many of the problems that confront the physician. A third source of uncertainty results from the physician's difficulty in distinguishing whether his ignorance in a particular area results from his personal lack of knowledge, or from the inadequacies of medical theory in general.

In this chapter we have examined two sources of information concerning the possible structure of relationships in the organization under analysis. We have attempted to generate certain hypotheses concerning the

³⁴Essay by R. Fox in R.K. Merton, The Student Physician, Cambridge, Massachusetts: Harvard University Press, 1957. On this point see also, T. Parsons, The Social System, The Free Press of Glencoe, 1963, chapter 10. F. Davis, "Uncertainty in Medical Prognosis, Clinical and Functional", American Journal of Sociology, vol. 66, 1960. Also J. Roth, Timetables, Bobbs Merrill Inc., 1963, chapter 2.

relationship between uncertainty and the formal organization of a bureaucracy. These hypotheses provide a framework within which we shall attempt to explain certain aspects of the social structure of the emergency ward. The literature on medical institutions, which we have briefly, and selectively, reviewed, will be used in the following chapters as comparative evidence. This will provide us with a yard stick with which we may measure the apparent differences that are significant in the operation of the ward.

CHAPTER 3

THE PHYSICIAN'S ROLE AND STRATEGY

CHAPTER 3

The Physician's Role in the Ward System.

The ward, or duty physicians are faced with a situation in which they are to a large extent able to set their own work pace. For the most part the number of patients is small, or the flow is irregular, so that they are able to conduct their affairs without having to make demands on other participants which are defined as "excessive". However, there is always the possibility that there may be a sudden influx of patients or the arrival of a genuine emergency case, which would result in a reduction in the amount of time within which the physician may act.

Similarly, because of the fact that the physician is dependent upon others for the majority of his information as to what is going on in the ward, he may find that he has to rely on the nursing staff for the necessary communications.

Both of these factors as well as certain others that we shall discuss later, set limitations upon the amount of leeway that the physician has on the ward. Being the specialist in the system has its rewards, in the form of high status in the community and a relatively large and stable income, but at the same time it is not a role that can be performed in social isolation. The physician is dependent upon the other actors as much as they are upon him. Certainly this is true of any system in which there is a division of labour and consequent special-

ization of function, but we shall argue that this is more so in the emergency room.

The physician's obligations on the ward focus upon diagnosis and prescription of the most efficient course of treatment that will restore the patient to a state of good health. To do this the physician must firstly have access to information relevant to the case at hand, and he must also possess a body of knowledge that will enable him to specify the cause of the illness. Secondly, he must be able to suggest the ways in which the illness may be remedied and this involves the application of further knowledge, in the form of theoretical principles, to individual empirical cases.

Theoretically, the process of diagnosis and treatment is relatively straightforward. However more than one writer in the field of sociology has noted the discrepancy between the theoretical and the actual processes and in one case this has been made the basis for the discussion of the physician's role.¹ Several factors are involved in the difficulty. Of these we see as being of considerable importance the fact that medical knowledge in many areas does not have very great predictive power. Whilst in theory, the causes of an illness may be defined, in practice, a variety of extra factors may intervene to distort the picture and make effective treatment impossible.

From the physician's point of view then, difficulty may be

¹See R. Fox, "Training for Uncertainty", in R. K. Merton edit., The Student Physician, Harvard University Press, Cambridge, Massachusetts, 1957.

experienced not only in defining the patient's illness, but also, when this has been achieved, there may still remain the problem of knowing what form of treatment to provide. For example, on one occasion one of the physicians was examining a young boy who was complaining of stomach pains and felt faint. He turned to the observer and said that it appeared to be an appendicitis but that this was one of the most difficult illnesses to diagnose. He said that there were at least four or five other ailments with the same symptoms and that you can never be absolutely certain which one is present.

In this particular instance, the physician ordered some blood tests to be made which would provide him with more information. When the results arrived, the blood count was well over normal, and he thought that this supported his diagnosis.

But such tests may not make the physician's task much easier. In fact as one of the internes noted, there may also be ambiguity in the meaning and interpretation of the results. The interne was talking to one of the specialists in the medical service, whom he had asked to come and examine one of the patients in the ward. After the discussion ended, the interne turned to the observer and said that he and Dr. _____ always seemed to disagree on their diagnoses. The writer asked if this happened quite frequently, and he replied that often it did, but that laboratory tests helped to remove much of this uncertainty, although on occasions there was room for disagreement on the meaning of these also.

In making a diagnosis, the physician may find that he is unable to reach any conclusive decision, and may attempt to overcome this by

abdicated his responsibilities to one of the residents in the appropriate service. This offers a means of overcoming the difficulty without involving any risk, which enables the physician to continue with his ward duties. However, there are limits on the frequency in which he may resort to this tactic. If for example he calls one specialist down too frequently, he is likely to find that the latter resents being called away from his own work and feels that the ward physician should rely on his own judgment to a greater extent. But there is also the possibility of a further sanction being applied. Reliance upon others in the profession may lead to the eventual reduction of the physician's status among his colleagues, since in a group that values competence, the apparent lack of skill and ability is not regarded as the mark of worth.²

The first of these sanctions can be illustrated by the following instance, in which the ward interne examined a young boy who had fainted at school and had been brought to the hospital by his mother. The boy and his mother were unable to specify any symptoms other than giddiness and nausea, the only other piece of information that was forthcoming was that the child never ate breakfast. The interne walked back to the nurses station and started writing the symptoms on the boy's chart. When it came to the section on diagnosis, he inserted "hunger". Having done this, he asked the head nurse to call down the junior in pediatrics for the boy.

²For a detailed analysis of this process in a different type of work situation, see P. Blau "Social Integration, Social Rank and Process of Interaction", in Human Organization, 18 (1959-60).

When the pediatrician arrived he asked the interne what he wanted him to do with the child. The interne replied, "throw him out he's just hungry that's all". At this the pediatrician wanted to know why he had been sent for if this was what the interne had wanted done. The latter's response was that he might as well examine the boy now that he was already down on the ward. The pediatrician answered that the interne should have thrown the boy out in the first place since it was his responsibility.

In this example it was another physician who had initiated the process of sanctioning the interne, but on other occasions the nurses may engage in this activity. Thus when an interne asked for the junior in medicine to be called in to see a man, whose only complaint was that he was suffering from "acute old age", the supervisor said, "Oh you're not going to call poor Dr. ___ down just to see that, are you?"

As an example of the second type of sanction, we will cite an instance when the interne criticized one of the G.P.s who had been on duty on the ward. The physician had started to perform an operation and after finding that he could not complete it, he called the interne in to take over for him and then left the room. This incident was recounted by the interne to another doctor and the supervisor, who both agreed with the judgment that the G.P. in question was incompetent.³

³The interne may also on occasions apply these sanctions to a duty G.P. Thus on one instance the G.P. called down the junior in pediatrics to examine a young girl. After the interne had seen her he came over to the G.P. and said, "What's the idea of calling me down to see this kid Ned? You could have treated her without calling me down." The G.P. said that he was a little uncertain and the interne replied, "Oh come off it, you know damn well what's wrong with her, and you could have let her go home". The G.P. said that a second opinion was always worth having, and walked off.

Uncertainty with regard to the diagnosis of a patient's illness, may then be seen to be a common problem confronting the ward physician. We have suggested that under such circumstances the physician may resort to seeking help from one of the residents of the various services in the hospital, but at the same time we have indicated that recourse to this practice may result in the application of sanctions by the other participants. Uncertainty may also arise however, as a consequence of an inability on the part of the ward physician to decide on the most suitable line of treatment to follow with respect to a patient.

Again we are able to cite instances on which this becomes apparent. On one occasion, when the interne was on duty alone, a man was brought in who had backed into a circular saw which had lacerated his shoulder and splintered the bone so that fragments had become embedded in his flesh. The man was placed in surgery twelve and the interne was asked by the head nurse to go and see him. After a little while he came back to the desk and asked the supervisor if she knew where the G.P. had gone since he wanted some advice and help in treating the patient. When told that the G.P. had gone off duty, he stopped and asked one of the physicians, who was walking down the corridor, whether he would come and give him some assistance. This latter doctor was not in any way connected with the ward.

In this type of situation the ward physician is likely to call on one of his professional colleagues for advice. Here it may be noted that the G.P. on duty is supposed to act as an instructor and spend some of his time teaching the interne. However, because of the increasing numbers of

patients availing themselves of the ward facilities, on most occasions both of the physicians are fully occupied.⁴ Thus in place of a formal tutoring arrangement, the interne is likely to ask the G.P. on duty if he can give him assistance only when he is involved in a situation in which he is confronted by uncertainty.

In the last few pages we have illustrated two sources of uncertainty that derive particularly from the generalized "physician role". As such uncertainty stemming from the structure of the physician's role is likely to be experienced by all occupants of the position, and is not specific to the ward system under analysis. We will now indicate some of the other sources of uncertainty that are consequences of the ward social structure. These pertain to the physician's role in the system.

In a previous chapter we noted that one item of equipment in the emergency room was the chart board, on which the patient's record is placed to signify the stage of treatment that he has achieved, or the stage that he is waiting to move to. The board is essentially a device to make the administrative aspects of ward procedure more amenable to control than would be the case if these were simply completed and left on the desk at the nurses station.

"However, there does appear to be an element of "double-think" in the G.P.'s attitude on this point. For example, one duty physician told the interne that he need not bother to stay on duty with him since he said that he would be able to cope with the number of patients on his own. A little later, the same G.P. was telling the head nurse and several of the graduate nurses that the system of teaching for the internes in the hospital was all wrong because there was always enough work for both the duty physician and the interne on the E.R., and the only time that the G.P. was able to do any teaching was when the interne was off duty, on the night shift.

The procedure with respect to the chart board is that the physician, on the completion of one case, will take the top chart from the category "waiting to be seen", examine it to discover where the patient is and the nature of his complaint, and then place the chart in the "being seen" category. The board is essentially a functional equivalent to the device discussed by Whyte in his analysis of the social structure of the restaurant.⁵ It serves to prevent the nurses from directly having to make demands on the physician and in this light prevents lower status female participants from initiating action for high status male actors.⁶

For the physician, the board functions to provide information necessary for the performance of his role but it also provides him with some indication of the total number of patients in the ward. This latter point is important in that the physician can modify his speed to keep in line with the number of patients, in the same way that technological innovations on the shop floor of a factory set the pace for the workers on the assembly line.

However, the ward physician faces one difficulty arising from this system, and that is that he does not know the seriousness of the injuries of the other patients waiting to be seen.⁷ Since he is often away from

⁵See W.F. Whyte, "The Social Structure of the Restaurant", American Journal of Sociology, 54, (1949), pp.302-308.

⁶One index of the status differences in the ward is provided by the Occupational Class Scale, constructed by B.Blishen. In this a physician receives a scale score of 81.2, whilst a nurse is assigned a score of 57.4.

⁷It must be remembered here that the information written on the patient's chart when he first comes into the ward is extremely limited, extending only to a brief summary of the patient's own statement. Such information as this could not provide the physician with much idea of the patient's actual injuries or of the extent of these. As such the initial statement of the patient's complaint may conceal considerably more than it reveals.

the desk examining and treating people in rooms which lead off from the central corridor, he is very largely isolated from the events that occur around the nurses station, especially those pertaining to the arrival of new patients. As a result all new patients to the ward are automatically seen first by the head nurse, who is on duty at the desk for the full length of the shift.⁸ She makes the decisions concerning where they should be placed and also is in a position to evaluate their condition. Given that the physician is responsible for all the patients on the ward, and given also the importance of his role in providing treatment for these people, it is in his interests to ensure that whenever a seriously ill person arrives he is aware of this.

Emerging from the division of labour between the physician and head nurse, is the possibility, from the physician's point of view, that there are people on the ward whom he ought to see since their condition warrants immediate treatment. Here then, we may indicate a further source of uncertainty in that this obligation of the ward doctor, that of providing treatment necessary for the restoration of health, cannot be fulfilled independently since the information for the specification of those in need of immediate treatment is not in his hands. The physician must rely upon the head nurse in two ways as a result. Firstly he must be sure that the latter is not withholding information from him, and

⁸During lunch and coffee breaks, the head nurse is relieved at the desk by either one of the supervisors or by a graduate nurse. Such transfers usually involve the passage of information from the person going off duty to the person relieving her so that there is a high degree of continuity.

secondly that she is capable of making accurate diagnoses of the patient's condition.

The first of these is well understood by the physician on the ward, and for example both Duty G.P.s and internes commented upon the fact that if they overplayed their authority they might well find that the nurses would not cooperate with them to the extent that they felt would be necessary. The first occasion on which this was brought up was in a discussion with one of the internes, who had read a statement of the aims of this research that had been prepared for the staff to examine.

He said that if one attempted to be too authoritarian toward the nurses one of two consequences would ensue. "Either they become psychologically flustered and less competent, or else they resent it and slow down." One of the other internes made a similar point when he said, "if you try to pull rank on them (the nurses) then they'll resent it and rebel against you. You can't go around trying to impress them, some of them are older than I am and have got a lot more experience, so you have just got to rely on them and not expect them to treat you as a god."

The same interne indicated the importance of the nursing staff to him when he outlined the qualities he associated with a good nurse. This event occurred after one of the supervisors had requested him to come and examine a man who had been injured in a road accident. After he had done this he came up to the observer and said, "I thought that that man must have been a real emergency case, but when I went and looked at him the only thing wrong was that he was slightly dizzy. She (the supervisor) is

always doing things like that, what does she think I am, a porter or something that she can order about? What I expect from a nurse is that she can decide whether a patient needs immediate treatment or not, make a rough diagnosis, know what the symptoms are, and then come and let me know. She is always doing this (calling him down without good reason). A nurse should be able to know when something is routine and when something is not, but there are only two people down here that can do that."⁹

The G.P. also raised the same issue when he told the observer that whenever physicians attempted to demonstrate their authority over the nursing staff, they were more than likely to find that they had lost their respect in the ward. "A doctor is not going to make out too well if he tries to show how superior a person he is, especially among the nurses."

From these examples it can be seen that there is a high degree of interdependence between the physician and the nursing staff. From the physician's perspective the adequate performance of his role depends upon his achieving the confidence and support of the nurses, and particularly the head nurse. But, in other respects, the duty physician and the interne rely upon the nurses to make their task more manageable.

Firstly, in the emergency situation, where time is defined as being in short supply the physician relies upon the authority of his office to coordinate the activities of the participants. Tensions are

⁹One of these is a head nurse and the other is one of the two supervisors.

likely to emerge insofar as any failure to respond to a command with the utmost urgency is defined by the physician as a rejection of his authority and results in the application of verbal sanctions. Such sanctions, in these conditions, are likely to result in a reduction in the recipient's motivation, in that her competency has been called into question in the presence of others.

Since in this situation conformity to directives is essential, non-compliance, for whatever reason, is defined as being a result of "stupidity" or of a lack of care on the part of the nurse.¹⁰ However the physician is also aware that his own behavior may well be a causative factor in creating the tension and strain. This seems to be true of the internes to a greater extent than the G.P.s, and may be a consequence of the differences in age of the two groups.

With reference to this point we can cite the words of one of the internes when he said, "if you are willing to be friendly to the nurses and joke with them, then they won't mind working with you. You may lose a bit of dignity but you can rely on them not to become jumpy when you've an emergency on your hands. Then you can't afford to fool around - you've just got to act really fast and not waste time on formalities." One of the other internes voiced much the same belief in discussing the emergency situation. "I always treat the nurses as friends and kid them along, so that I know when I want something done I can count on their cooperation.

¹⁰On tension in the operating room see R. N. Wilson, "Teamwork in the Operating Room", Human Organization, 12, (1954).

In a real emergency, well like just now in surgery twelve, you can't be friendly because it takes up time. I just went in there and told Miss D_____ what to do and she went ahead and did it." This was recounted by the interne after he had treated a woman who had been injured in a car
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 accident.

In these examples it may be seen that the physician on the ward is aware of the possibility that the nursing staff may withdraw their
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 support and engage in some form of ritualism. At least, from the physician's perspective, the question of whether or not the nurses' motivation will remain constant throughout the period of the emergency, is dependent upon his own behavior toward them. In the relationship then there is a high degree of indeterminacy which rests upon the extent to which the physician can expect the nurses to maintain their support.

Such support may rest though on more than the motivational aspect, as may be seen in the following example. Here a nurse comments that by avoiding certain of the formal rules applying to her, she may save the

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It is interesting to note that in this instance the interne had more confidence in the nurse's ability than did the head nurse, who criticized the interne for having not remained in the surgery to supervise her and make sure that she was doing what he had ordered.

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Ritualism is one possible way of acting in a situation where the actor has little autonomy and where others of higher status have considerably more authority. In this type of situation, adherence to the formal rules provides one means for the low status actor to minimize the demands made upon him. See on this, R. L. Coser, "Authority and Decision Making in a Hospital", American Sociological Review, 23 (1958).

physician time. After saying that on other wards in the hospital a nurse would have to get a written order before she could do anything for a patient, she went on to say, "Say a cardiac arrest comes in (to the E.R.), and a doctor tells you to do something, you don't get a written order first -- after everything is all over you write up what you did, and then get him to sign it. It would be dangerous to have doctors distracted by that sort of thing, especially if the patient is in a bad way."

In this description of the sources of uncertainty facing the physician we have outlined three types, two of which are specific to the ward setting. It is necessary to outline one more such area before turning to an analysis of the ways in which the physician attempts to control these.

The final problem facing the physician in the E.R. is closely related to those we have already outlined, in that it rests upon the nurses' willingness to support the physician. The head nurse, because of the central position that she occupies in the communication network of the ward, is able to perform a "protective" function for the physician. This function involves several types of service, such as providing information on the formal rules applying to the ward, and correcting mistakes made by the physician. The first of these two may be seen as essentially a form of action which prevents mistakes from being made, unlike the latter, which functions to prevent minor mistakes from being transformed into "catastrophes".

As an example of this first type we will supply an instance when

the ward physician asked the head nurse for advice concerning what he should do with one of the patients. The patient in question had been hit by a car and been quite seriously injured. She was placed in surgery twelve and a little later was seen by the doctor on duty at the time. Two of the questions he asked the head nurse suggest his lack of knowledge of the formal ward rules. The first request for information was, "Miss T____, this woman has possible leg and rib fractures, what do you think I ought to do with her?" The head nurse answered that he should request the portable x-ray machine to be brought down and have her x-rayed on the ward to ascertain whether she did have these and any other fractures. He then asked, "Well, should I call down one of the residents in surgery to see her, or try and find out who her family doctor is and get him to come in?" The head nurse then told him that he should call down the resident in this case.

A little later he came back to the desk and asked how long he should wait for a patient's own doctor to come in before he started to treat the patient himself. Again the head nurse provided him with the information that if the patient was seriously ill, then he should go straight ahead with the treatment, but that if there was no real urgency, then he would have to wait twenty minutes and then either start some form of treatment, or call in one of the residents.

Another illustration of this process can be seen in the following example, when the duty physician consulted the head nurse about a young boy whom he thought had a broken leg. Since the x-ray results had not

been received after about an hour, the physician asked the head nurse what he should do. The head nurse replied, "Really we ought to wait for the results before we do anything, but the kid's got a pretty obvious fracture so we might as well call the senior in orthopedics".

Both of these incidents demonstrate that the head nurse has information concerning formal ward procedures that she can supply to the physician for his protection. But where the physician makes a mistake, either in the process of treatment or in the administrative routine, the importance of correcting these is much greater, and hence the importance of the head nurse for him increases similarly. The examples which we shall now proceed to exemplify both the correction of administrative and medical errors.

In the first example a G.P., who had come into the ward to treat one of his own patients, wrote his orders on the wrong chart without realizing the error, and then left the ward. When the mistake was discovered by the head nurse she told one of the graduate nurses that she was going to copy the orders on to the correct chart, and "take the responsibility for it". Later in the evening the physician passed through the ward and she managed to stop him and tell him what had occurred. He appeared to be quite shocked by this and said that it was a good thing that she had managed to catch him, and that he might have lost his admitting privileges had she not discovered it.

On another occasion, a child was brought into the ward after taking a large dose of aspirins. The head nurse informed the interne

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that there was a child that he would have to lavage, and he went off to perform it. When he came back to the nurses station after having pumped the child's stomach, he asked one of the nurses to take several samples of venous blood for laboratory testing. The head nurse asked him if he wanted to have a salicylate level taken and he replied that he had not thought to have that done, but that it would be best to do so. ¹⁴

Another incident revolved about the physician's failure to check the results of x-rays he had ordered on a child who had broken his leg. The physician came up to the desk with the boy and started to write up a note for him, which he was to take to his own family doctor. As he was doing this, one of the nursing assistants asked the boy if he had been up for an x-ray and when he replied that he had, she commenced to examine

¹³A lavage is an operation in which the patient's stomach is pumped to remove any toxic substances that he may have swallowed, and its purpose is to prevent these from being absorbed into the blood stream.

This is one operation which does not involve the physician making any decision, rather once the nurses know what the patient has swallowed, they are able to say what treatment is necessary since the procedures for the various poisons are listed in a manual which is kept at the nurses station. The decision to perform a lavage rests upon what is stated in the manual, and in consequence the head nurse may frame her demands on the physician in terms of this fact. This serves to legitimate the head nurse's actions when she requests him to perform a lavage.

¹⁴This reference to the test for salicylates is important, given the context in which it was made. Several years previous to this, an interne had neglected to test for the amount of salicylic acid in the blood stream of a patient who had attempted to commit suicide by taking an overdose of aspirin. As a result of this oversight the interne made an inaccurate diagnosis, and the patient died. The interne was held legally responsible for this, and was dismissed from the hospital before he completed his internship.

his chart. She then said to the physician, "You know that he has got an undisplaced fracture don't you?". The physician replied that he didn't know it, and that he would put a splint on the boy's leg at once.

On a different occasion, a woman who had spilled acid on her hand was seen and treated by the interne. After he had done this he went off duty. Some time later the woman appeared at the desk and told the nurse that the interne had failed to look at her hands, but instead had examined a rash she had on her forearm which had nothing to do with the acid burns. The head nurse then informed the duty physician what had happened and asked him if he would examine the woman and treat her if this was necessary. The following day the interne was told of his error by one of the nurses.

These examples have been cited to show the importance of the head nurse and other members of the nursing staff, for the physician. In each case the mistake that was made was corrected by the nursing staff before its consequences could have their full impact upon the patient, and more important, on the physician. Whilst we are not setting out here to explain the incidence of errors by physicians, in terms of the ward social structure, we are suggesting that the nursing staff, and especially the head nurse, are in a position to recognize them, and bring them to the attention of a physician before their consequences are felt.

In the first part of this chapter we have been concerned with specifying areas of uncertainty pertaining to the physician's role in the ward. We have suggested four such areas, the first of which is related to the role through the inadequacies of either medical theory or of the

the particular incumbent. This is not to say that uncertainty always arises in the examination and treatment of patients, but rather that some cases may constitute more of a problem for the physician than others.

The second source of uncertainty stems from the division of labour between the physician and the head nurse, in which the former is the specialist whilst the latter performs the administrative tasks. This element of differentiation functions to create a barrier to the transmission of formal communications between the two. Thus the physician, who desires information on each of the patients on the ward, must rely on the head nurse to provide him with this informally. Uncertainty, in this type of situation, arises from the physician's reliance on the head nurse to perform diagnoses, and to pass on information concerning the state of health of the patients.

The third type of situation giving rise to uncertainty was the emergency. Here the physician defines the nurses' willingness to participate as being problematical. Insofar as the physician believes that his own actions may have a dysfunctional impact on the nurses, he is likely to experience some insecurity in this situation, in which prompt and accurate responses to his orders are crucial for the success of the operation.

Finally, in discussing the "protective" role of the nurse, we have tried to show how the former shields the physician from the mistakes he makes in the course of his activities on the ward. In this respect, the nurse is a significant figure in the ward system for the doctor, since

she contributes to the successful performance of his role.

The Physician's Strategy in the Ward.

In this section of the chapter we intend to discuss the physician's modes of adjustment to the situations outlined above. We will be concerned with showing how the physician's behavior can be understood as a series of adjustments to uncertainty. Bales has provided a definition of social structure that fits very closely with our own when he describes it as follows:

A basic assumption here is that what we call social structure of groups can be understood primarily as a system of solutions to the functional problems of interaction which become institutionalized in order to reduce the tensions growing out of uncertainty and unpredictability in the actions of others.¹⁵

Whilst Bales' interpretation of social structure focusses upon the uncertainties that are present in any interaction system, our interests lie in the recurrent forms of behavior which function to bring about some degree of predictability in a situation where uncertainty is a highly significant condition.

This point is very important for a complete understanding of the physician's behavior. Thus, whilst in other organizations uncertainty may be present, its consequences for the participants are very rarely as crucial as they are in the ward situation. For example, in commercial enterprises, a mistake will not be as visible as in a hospital, since in the latter case the community has an interest in ensuring that those who

¹⁵R. F. Bales, Interaction Process Analysis, Cambridge: Addison-Wesley Press, 1950, pp.15-16.

are responsible will be punished, or at least prevented from remaining in a position where they might repeat the error.

The significance of uncertainty for the physician may be seen in the following examples:

When the observer arrived one morning the duty physician and a group of graduate nurses were standing around the desk discussing the possibility of socialized medicine being introduced into Canada. The physician started to say that he thought it would make a lot of difference for the internes. "When I was an interne you could get away with anything. One time a pair of twins were brought in, both of them complaining of much the same symptoms. Well I examined them and decided that one needed to be admitted and I sent the other home, but in the morning which of them do you think was dead?" The supervisor said that it was most probably the one he had allowed to go home. He replied that that was right and when asked what had happened to him he said, "Nothing. In the war you could get away with anything."

If this account is true, then it would tend to illustrate two things. Firstly, the lack of predictability in the diagnosis and treatment of patients is highlighted, and secondly, it shows how in the present time the possibility of making such a mistake and going unpunished is far less likely.

Other examples tend to illustrate the physician's dilemma in more "mundane" contexts. Two internes were sitting at the station discussing a patient that they had just examined. One of them suggested that they should toss a coin to decide whether they should admit the man or not.

Whilst this suggestion was made in a joking manner, the second interne responded quite seriously by saying that they had better admit him since if they let him go home he would be sure to "die in the street".

At another time, the physician on duty on the ward commented that if an epileptic patient, who wanted to sign himself out of the ward, was allowed to, he would most probably "have an attack and fall under a bus".

On another occasion one of the internes was talking to the observer about patients and comparing the E.R. to general practice. "At least in general practice you get to know the patients you can trust and those that are just layabouts. Here though, (the E.R.) you can't tell and there is always the chance that they do have something wrong with them. You've always got at the back of your mind the knowledge that they will drag you through the dirt if you make a mistake. You know, if you do make a mistake they are down on you like a ton of bricks and drag you through it and they can really ruin your chances. You can send someone out of here who you think has just got a cold, but you're never certain that he won't have a coronary when he gets out through the door."

In each of these examples, the physician has shown an awareness of the consequences of making a mistake. This awareness is more than heightened by the knowledge that they have of the incident concerning the interne's failure to take adequate precautions in treating the patient who had taken an overdose of aspirin.¹⁶ In general they tend to be critical of the hospital administrators who they feel will not support a physician if he

¹⁶See above page 55.

does make a mistake, as was the case in the previous incident.

The ward physician is then, in a context in which there is some degree of risk attached to the performance of his role. The behavioral strategies that he adopts must be seen as resulting from this fact and from the types of uncertainty outlined above.

As we have pointed out before, the majority of patients that come into the E. R. are not emergency cases. Estimates of the percentage that are emergencies vary among the participants so that one interne puts it as low as being somewhat below twenty percent. As one of the G.P.s phrased it, "in all the times I've been in here (on duty), I can only remember one time when I had only seconds in which to save someone's life."

This fact tends to pervade the physician's attitudes toward the ward so that for the most part they are highly critical of the majority of patients that come in. For them, as well as for the nursing staff, the E.R. is coming to resemble a general clinic which has to deal with a wide range of illnesses and injuries, and is losing its original identity. As a consequence of this change, the physician is no longer in a position where he must act with speed. The very fact that the majority of patients are not critically ill means that less urgency is required both in diagnosis and in treatment.

From the physician's perspective, this decrease in the need for immediate action is advantageous, in that it means that more time can be spent on the central problem of diagnosis. The increasing availability of time that the change in the clientele has brought about, reduces the likelihood that a mistake will be made. Thus, for the majority of patients,

the expenditure of time on conducting tests of various sorts will not significantly affect their chances of survival, rather it increases the likelihood that an accurate diagnosis will be made, and that in consequence effective treatment will be provided.

It may be seen then, that the physician is in a relatively secure position with regard to the problem of diagnosis. If, for example, he is unable to achieve a clearer picture of the causes of a patient's condition with the results of the tests he may have made, he is still able to call in one of the resident specialists.

One consequence of the changing definition of the B.R. then, is the increase in the amount of time that the physician has at his disposal. The increased availability of time means that the ward physician is able to avoid taking immediate action with regard to each patient and may instead take more time over collecting information relevant to the case under consideration. If we take, for example, one source of information, the laboratory results, we may see that these consume varying amounts of time for completion. Thus one of the quickest tests will take between ten and fifteen minutes, whilst some others take anything over one hour to complete.¹⁷ Necessarily, the time each of these tests takes depends in turn on the number that are being carried out at any instance, thus the more that are being made, the longer the results take to come through to

¹⁷For example the hematocrit test, which measures the % of red blood cells in the plasma, can be made in about ten minutes. The test for cholesterol, which indicates the amount of fat in the blood stream, may take considerably longer, taking well over an hour.

the ward. Since usually more than one test is taken on a patient, the length of time that he will remain on the ward is likely to be roughly twenty minutes. Again this may be seen to vary with conditions in the ward, so that where there are a large number of patients to be examined and treated, it will increase. Similarly the nature of the patient's complaint will also influence his length of stay in the E. R.

For these reasons, then, it may be seen that the physician is in a position where he may spend more time with patients than he would be able to in dealing with "true" emergency cases. This can be exemplified by the following instances, where the physician asks permission to leave patients in the ward for observation purposes. On the first occasion the interne was called to the ward in the morning by the head nurse who wanted him to look at two patients, one with asthma and the other with a possible coronary condition. When he had examined the first of these he came back to the desk and said that he thought the first man was having an attack but wanted to know if it would be possible to have him kept in the ward for a further half hour and he would recheck his condition then. The head nurse agreed with this and the interne went off to look at the second patient. After he had done this he came back to the nurses station and said, "I'm not really sure about this man. Would it be all right if I leave him there while I decide what to do?"

At about nine fifteen on the same morning, forty-five minutes after the interne had first seen the patients, he again asked the head nurse if it would be possible to leave the patient with asthma in bed for a further half hour. This was agreed to, but at 11.30 A.M., when the head nurse was

going off duty for lunch, she told the nurse who was relieving her, "And tell Dr. _____ to make up his mind about those two people, nearly all the other beds are full as it is."

A similar incident involved the duty physician. On this occasion he examined a man and then asked the head nurse if he should let the man go home. The head nurse said that she did not know anything about him, and his response was that if it were all right with her then he would leave him in bed until two hours later when a specialist would be able to see him.

Another example of this process occurred during a particularly busy evening when the G.P. on duty told the head nurse that he wanted to keep a patient in for "an hour or so for observation".

In these examples we have shown that where the physician feels that time is not precious he may make use of the ward for the purposes of observation. In effect then, the relative infrequency of emergencies per se, is functional for the physician in that it leaves him with time in which to make certain of his diagnoses and the type of treatment to provide.

However, with respect to the other areas of uncertainty that impinge upon the performance of his role, the physician's behavior involves a greater consideration of the other ward members. Insofar as each of these centers around the relations with others on the ward, his interests must to some extent lie in ensuring their support. As we have pointed out above the physician is aware of this problem and is concerned with it. The belief that by asserting one's higher status over others the physician will endanger his position on the ward, is quite strongly held, so that

any attempts at status equalization by him, will, from his perspective, be more efficacious.

The physician in the E.R. is then, oriented toward other ward members to the extent that these perform significant functions for him. By building up a set of strong informal bonds with them, he is attempting to bring into effect a form of reciprocity in which he is able to rely upon their support. In a sense then we are suggesting that the doctor-nurse relationship can be viewed as a bargaining process in this situation, in which the willingness to enter into primary relations is offered in return for the nurses' motivation to give these general forms of assistance. The physician's behavior is designed to ensure that the uncertainty he faces, with reference to the nurse's participation, will be removed.

Thus in looking at the data on the physician's relations with the nurses we find that he does tend to avoid introducing considerations of status and does not demand deference from them. For example on one occasion the duty physician spent about an hour in the nurses station telling jokes to the head nurse and several of the graduates. Here it was apparent that the joking was not a manifestation of the physician's superior position with respect to the nurses since the physician was himself the butt of several of the jokes. At another time, one of the duty physicians responded to a joking comment made about his ability as a doctor by a supervisor, by taking her over his knee and delivering a mock beating. In this example as in the one above, it is clear that this is joking between equals in that the interaction is not one sided.

If we were examining a system in which one actor's higher status gave him the opportunity to initiate joking with a lower status person, we would not expect the lower status person to respond in kind by mocking the former, as occurred in these two cases.

These are not isolated incidents, rather there appeared to be a constant theme of informality present in the interaction between physician and nurse. This is recognized by both parties. Thus one duty physician commented, "It's not really like this on the other wards. You may go in to see a patient, write out an order on the chart, and then leave without having seen a single nurse. Down here though, you come on after about three weeks and naturally you want to know what's been going on". One of the internes made a similar point when he was asked if he was liking it on another service that he had moved to. He said that he didn't have much to do with the nurses there and that there was little need to communicate with them. Similarly the nurses recognize the relative informality in the E.R. as compared to the other wards. Thus one nurse remarked that on other hospital wards things were very different and that there was a "formal front to things", whilst in the E.R. most of the time "things are very friendly all round". This view is not wholly shared by the student nurses, one of whom said that while the relations between nurses were not very different, as between the E.R. and other wards that she had been on, relations with physicians were "a lot more relaxed and easy".

Internes, perhaps more than the G.P.s, engaged in joking and banter with the nurses and tended to be responded to in much the same

terms. Thus one of the supervisors remarked upon the three internes who had been on the ward during the observation period, saying, "They've all been pretty friendly and they are willing to fool around with us, but in some things they are very different. By the time they leave the ward you know what sorts of things they'll want and you can do it before they ask. You get to know the type of suture thread they'll use on different parts of the body and the local anesthetic they use." In this example the supervisor indicated that the internes tended to become involved in the informal activities of the ward. An interne reflected a similar attitude when he said, "The nurses are really pretty helpful. If you are willing to be treated as an equal then you know that you won't have any difficulties. I know I don't have the respect that some of the big surgeons get, but it does not matter if you know that they (the nurses) are on your side." Such informality usually referred to joking, fooling around and on occasions horseplay. On these instances the interne would be as much the initiator as the receiver of the joking.

With respect to the deference accorded to the physician, it may be seen that the interne was less likely to be the receiver of honourific forms of address than the duty G.P. Thus internes were addressed by such titles as "sweets" and "chief" and on some occasions were called by their Christian names. However, the true mark of the interne's equality with the nurses came at the end of his term of office on the ward, when he would be submitted to a ritual ceremony which was held to be important by both parties. This ceremony appeared to be unique in the hospital, although this may be a consequence of the fact that the facilities for

performing it were only available to the E. R. staff. The rite was conducted by representatives of the ward who came from each of the various role groups, thus for instance student nurses were as likely to be involved as the supervisors, and orderlies as likely as internes from other services.¹⁸ The central feature of the ceremony was the placing of the interne who was leaving, or who had left, the E.R., in a plaster cast which covered most of his body. He would then be left in a room in the ward for some time, where he could be viewed by various participants who would comment upon his predicament. Some internes would be left to get themselves free by whatever means they could find, whilst others would be released by the nurses after a suitable period of time, or when some reason made it necessary to vacate the bed.

The point to be emphasized here, is that this ceremony was representative of the general equality and informality that was present in the relationships between the nursing and interne staffs, and that it demonstrates the absence of considerations of status.¹⁹ The ceremony was institutionalized to the extent that one of the internes, who had not undergone it, told a nurse on one of the other wards that he thought that the nurses on the E.R. had not liked him because they had not attempted to

¹⁸ These internes had usually done their period of service in the E.R. and would be known by the ward staff, who would outnumber them during the ritual.

¹⁹ It could also be pointed out here that this particular rite was not reserved for the internes, since on one occasion one of the supervisors was subjected to this form of treatment.

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put him in a cast.

Thus in their treatment of the internes who served on the ward, the nursing staff disregarded many of the formalities of status. Not only were they allowed to participate in the informal activities that took place in the ward, but at times their competence was called into question in a lighthearted way. This was usually less of a demonstration of the nurse's superiority, in terms of their knowledge of medicine, than an attempt to maintain the status equality. For example, when several of the graduates were questioning one of the internes about a diagnosis he had made on a patient the previous day, one of the nurses pointed out to him that what he had given as a diagnosis had been wrong and that the patient had been found to have some other complaint. When the interne replied that that was the diagnosis he had given, the two nurses burst out into laughter. At this the interne got up and walked off to look at another patient.

The duty general practitioner was less likely to be confronted by this form of behavior on the part of the nurses, but nonetheless, he would still be shown that he was accorded a position in the ward in which his status or prestige was not deferred to. Writing about the tendency of nurses to subordinate themselves to physicians, Wessen says: "The reluctance of nurses to assert themselves vis a vis physicians is the despair

²⁰This particular interne escaped the ritual only by accident. During the week after he left the E.R., he happened to damage his ankle and was put in a cast for medical reasons. The nursing staff thought that this constituted good enough grounds for giving him preferential treatment in this respect.

of those who are concerned with helping the nurses improve their status. In its most typical form it involves the nurse stepping back out of the picture if a doctor enters into the conversation which may be going on between a third party and herself."²¹ If this same criteria may be employed in the present study, then it will be seen that it does not give us the same results. Rather, nurses tend to behave in such a way as to ignore the physician on many occasions. One of the best examples of this is the observation that when a nurse was in conversation with a physician, she would often turn away whilst the doctor was still talking, to speak to another physician. For an example we can provide the following instances. The first occasion is one in which the duty physician was discussing a patient with the head nurse, after a little while a nursing assistant approached her but did not say anything. The head nurse, without saying anything to the physician, turned to the nursing assistant and asked if there was something she wanted. The physician did not stop talking but after the head nurse had turned away, he addressed his remarks to the air. Eventually the head nurse turned back to him and asked if there was something else that he wanted to tell her. Another incident

²¹A. F. Wessen, The Social Structure of a Modern Hospital: An Essay in Institutional Theory, Unpublished Ph.D thesis, Yale, 1951, pp.217. Goffman has argued that in situations where authority relations come into play, the relaxation of formal status distinctions by the superordinate actor is functional since it ensures that the other participants in the system will not withdraw. However, he also notes that subordinates who practice role distance are likely to be defined as rejecting the authority invested in the superordinate actor.

In the E.R., we suggest that the physician does allow the nursing staff to enter into a joking relationship with him in which he becomes the butt of the humour, even though he loses status through doing so. See E. Goffman, ibid., pp.128-129.

reflected the same pattern, only this time with the interne. The head nurse was speaking to someone on the telephone and wanted to get some information on one of the patients in the ward. She told the person to "hold on" and then called for the interne to come to the desk over the intercom system. Meanwhile she went over to the chart board and took down the patient's chart and obviously found what she wanted, for she returned to the telephone and finished the conversation. By the time the interne came to the desk, she had already finished the call. She turned to him and said "it's all right, I don't need you now."

In neither of the above incidents did the physician in question attempt to demonstrate his authority or status over the nurse and the only indication that he had not approved of the way in which he had been treated came when the interne turned to the observer, raised his hands in the air, and gave a rather cynical smile.

We may also cite evidence to support the hypothesis that the physician tends to treat the nurses with relative informality, by citing data on the interaction patterns on the ward. Again we may use Wesson's study as a source of comparative material. To augment his argument that in the hospital he studied there was very little contact of any kind between nurses and physicians, he collected information on the interaction between these two groups. This evidence he presents in the following table.²²

<u>Initiators of Interaction</u>	<u>Receivers of Interaction</u>	
	<u>Doctors</u>	<u>Nurses</u>
Doctors	169 (27%)	53 (9%)
Nurses	53 (9%)	346 (56%)
	621 (Total number of interactions)	

²²A. F. Wesson, ibid.

From this table it can be seen that the majority of interaction, regardless of content, is directed within each of the role groups involved. The higher rate of interaction within the nursing group can be explained in terms of the fact that the nursing group was present throughout the period of observation, whilst the physicians appeared only intermittently.

Our own findings may be summarized in the following two tables. The first of these deals with instrumental actions.²³

<u>Initiators of Interaction</u>	<u>Receivers of Interaction</u>	
	<u>Doctors</u>	<u>Nurses</u>
Doctors	9 (1%)	243 (19%)
Nurses	185 (15%)	787 (64%)

1224 (Total number
of interactions)

The main point which we wish to draw from this table is that whilst the within group interaction for the nurses is still the largest proportion of the total, the amount of interaction between the groups has increased as we suggested. Thus the amount of interaction going within groups was, in Wessen's case, 83% of the total, whilst in our case it was only 65%, and this involves almost a 100% increase in the amount of interaction going between groups.

If we also examine the direction of the expressive interactions

²³Recordings were made over a period of 20 hours, however it was only after the first session of observation and recording interaction, that the writer introduced the "expressive"/"instrumental" distinction. Thus these tables represented observed interaction over a period of 17 hours.

To make our table comparable with Wessen's we excluded interaction that was directed from or to, ward orderlies and clerks.

the pattern remains much the same, and the amount of interaction going between groups is again larger than in Wessen's study.

Receivers of Expressive Interaction

<u>Initiators</u>	<u>Doctor</u>	<u>Nurse</u>
Doctor	15 (2%)	95 (14%)
Nurse	111 (16%)	477 (68%)
		698 (Total number of interactions)

Again with the percentages of expressive interaction, it can be seen that there is considerably more directed between groups than was true in Wessen's analysis. More to the point, the largest drop has been in the group of physicians where the decline has been 26% and 25% respectively. The gain that has been made has occurred in the physician's interaction with the nurses. In Wessen's table, 76% of the physician's interaction went to other physicians, whilst in our two tables the percentages going to nurses from doctors, were 96% and 86% respectively.

This suggests that in the E.R. physicians, regardless of their status tended to be more involved with the nursing group, both in relation to their work on the ward, and with respect to the informal activities of the ward system, than was the case in the other study. Here it could be argued that the differences could be put down to changes that have occurred over time in the nurses relations with physicians. In a sense this would be to argue that over the period between these two studies, there has been a general change in the nurse's position with respect to physicians. This argument has been raised by Presthus, when he says, "nurse's attitudes also relate to their associations with doctors, who

not only have great prestige with nurses but also tend to have a democratic working relationship with them, in which banter and joking cancel out status differences between them".²⁴

However, this argument appears to fall down when an examination is made of the various studies that have been made of the relationship between doctor and nurse, since these studies show that large variations can and do occur within hospitals.²⁵ Thus Coser's study of the medical and surgical wards, which Presthus cites in his argument, demonstrates that large differences may occur and that the primary reason for this lies in the authority structure. Thus in our terms, it would not be reasonable to argue that the nurse-physician relationship is a uniform one throughout a given culture or set of cultures. Rather, we suggest that the relationship is influenced by a variety of situational factors which operate on the ward level.

Summary.

To summarize our general argument so far in this chapter. Firstly in dealing with the physician's role in the E.R. we have been concerned with showing that certain areas of uncertainty surround performance of the role. These derive from three main factors; uncertainty stemming from the physician's lack of knowledge concerning the transmission of information crucial to him, uncertainty concerning the nurse's willingness to participate, and thirdly uncertainty resulting from the nurse's willingness to perform the protective function for the physician.

²⁴R. Presthus, The Organizational Society. Vintage Books, 1965, p.236.

²⁵See R.L.Coser, ibid. and also her article in The Hospital in Modern Society, edited by Friedson, Glencoe Free Press, 1963.

Given these contingencies in the physician's role, we argued that the strategy he adopts would be designed to ensure the continued participation of the nursing group.²⁶ Thus we pointed to the physician's involvement in the informal activities of the ward and also pointed to the nursing group's reaction to this. We suggested that one index of the degree to which the physician was treated as a status equal was the tendency of the nurses to minimize the deference that they showed toward him. Further evidence to support the argument was derived from the information on interaction between these two groups. Here again we showed that the physician was more likely to initiate action for nurses, both instrumental and expressive, than he was to do so for other physicians.

In the following chapter we intend to examine the role of the head nurse and discuss the ways in which the contingencies operating on it structure her relations with the physician. In this chapter we will also be concerned with showing the relationship between the role of head nurse and the other participants in the ward system.

²⁶ For a similar analysis to our own, see E. Goffman, essay on role distance in his Encounters, Bobbs-Merrill Company Inc., 1963, pp.120-122

CHAPTER 4

THE HEAD NURSE'S ROLE AND STRATEGY

CHAPTER 4

In this chapter we will follow the same procedure as in the last, and examine the formal position of the head nurse in the ward. This will entail specifying the ways in which this role is bounded by its social environment. Given this information we will proceed to analyze the strategy that the head nurse adopts towards the other participants in the ward. Her behavior will be viewed as an attempt to make predictable a situation in which there is a high degree of uncertainty.

The Role of the Head Nurse.

In the last chapter we examined the uncertainties inherent in the physician's position in the E.R., paying particular attention to those that derived from the social relationships in the ward. For the head nurse, however, the major source of uncertainty resides in factors operating outside the ward system. Thus no member of the E.R. is able to influence the number of patients who will be injured, or fall ill, and will come into the ward at any one time. Certainly the participants attempt to predict whether it will be busy or not at a given time, but the accuracy of such predictions in this context is not very great.¹

¹ The first time the writer went on an evening shift, he was told that he was going to see a lot of action since this was pay night at one of the local steel works, and in consequence a lot of people would be brought in who had been involved in fights. However, the whole shift was one of the quietest that the writer observed. The duty physician and the nurses spent most of the time in informal discussion at the nurses station.

As a consequence of this element of uncertainty, the role of head nurse assumes a position of some considerable importance in the ward system, since the problems of allocating both personnel and facilities falls upon the incumbent. In this situation, the head nurse is responsible for the allocation of ward facilities, under which category we include both personnel and equipment, and is directly influenced by the flow of patients into the ward. The larger the flow of patients, the more directly she must intervene to ensure that a blockage does not occur. However, such intervention engenders two types of strain which in turn tend to reinforce the initial problems of allocation. But at the same time, the significance of the head nurse to the physician also increases since the larger the number of patients to be seen and treated, the less time the physician can spend on acquiring information from the head nurse. Thus he must rely on her to pass on this information voluntarily which in turn weakens his bargaining position.

From the point of view of the head nurse the crucial problem facing her is the question of whether enough facilities can be mobilized to prevent patients from remaining on the ward for long periods of time.

1 cont'd. Certainly the ward members are able to make ex post facto "predictions" about the day's events. For example, the usual statement of this type is "I felt it in my bones this morning that something was going to happen". Such remarks may well function to give the participants a semblance of perceived control over their environment, but they are unlikely to provide any guide as to what will happen next in the situation.

See on this H. Garfinkel, "The Routine Grounds of Every day Activities", in Social Problems, 2, (1964), pp.225-250. See especially pages 247-248, on the et cetera clause.

The primary facility is that of beds on the ward, since unless she can provide enough of these, the process of examination and treatment will be slowed down. In part this consideration rests upon the fact that the participants accept a value concerning privacy and confidence.

This value refers to the right of the patient which specifies that what is passed between himself and the physician, will be kept confidential. But it also involves some notion of privacy, in the sense of being shielded from the eyes of others who are not involved medically with the patient. This aspect is supported by the physician in that nobody may intrude and attempt to influence him in his decision. One concern of physicians and nurses alike is that of preventing people, other than the patient himself, from acquiring information that would enable them to enter the bargaining arena. Both parties feel that the presence of a relative or friend during the examination or treatment may jeopardize the effectiveness of the medical treatment provided, since the person may well try to make the physician follow a line of action that would not be beneficial for the patient, or alternatively might not understand what the physician is doing and attempt to stop it.²

Given this orientation, the head nurse must provide rooms in which patients can be examined in privacy. This in turn involves ensuring that patients do not remain on the ward for any great length of time. In

²On a large number of occasions both physicians and nurses criticized relatives or friends of patients who asked for information on the patient. There appeared to be consensus on the idea that anybody who was not undergoing treatment in the ward should not be allowed access to it.

order for the physician to properly carry out his role in the ward, he must have access to the various rooms in which the specific treatments can be carried out. Thus, on the day shift, the physician may find that all the surgeries are being used, and in consequence may be unable to treat a patient who is in need of suturing. Alternatively, he may wish to examine a patient in one of the side rooms and find that all these are occupied.

Thus the primary concern of the head nurse is that of providing rooms to the physician for the purpose of examination and treatment. However, as we noted earlier, the head nurse is also in a central position with regard to the flow of information in the ward, and is, in consequence, in a position which enables her to make a diagnosis when a patient first arrives on the ward. As new patients arrive, the head nurse must make some evaluation of the seriousness of the patient's complaint, and assign him to one of the rooms. As a result some of the rooms may be taken up by patients who have not been examined by the physician, but who the head nurse feels need to be in bed. Similarly, since the ward members do not have control over the availability of beds in other wards in the hospital, there are likely to be some patients who have been examined, and officially admitted to the hospital, but who have to remain in the E.R. until there is room for them on the appropriate ward. A further reason why patients may take up bed space in the E.R. is that they are waiting for a specialist to come to examine them, or for their own G.P., and this may involve their waiting for up to several hours.

Thus, each of these three factors may operate to reduce the amount of bed space on the ward, and may lead to a blockage of the patient flow

through the system. Since the distribution of bed space is the central feature of the head nurse's role, it can be seen that this constitutes a source of uncertainty for her.

Similarly, with respect to the allocation of ward staff, the number of patients intervenes to make any planning impossible since there is no rational basis on which predictions can be made. Thus it would be impracticable to assign nurses to tasks which they would be expected to perform throughout the day since changes in the number of patients on the ward would lead to some degree of imbalance. Thus there is no firm division of labour on the ward, apart from the fact that a head nurse, who is not on duty at the desk, acts as an assistant to the physician in the surgeries. However, even this arrangement is not a fixed one and the non-duty head nurse may be required to perform the same tasks as the graduate and students when the surgeries are not in use.

The absence of any clear division of labour makes for the centralization of authority in the hands of the head nurse who in consequence has autonomy with reference to the problem of allocation. Thus given that authority rests with the head nurse, it may be seen that she has two possible modes of proceeding. She may use her authority to allocate personnel or she may allow this to go on automatically, in which case the nurses take the initiative in deciding what to do, and only intervene when no one is available to carry out some important task. Later in this chapter we will attempt to explain the conditions under which each of these strategies is employed.

So far we have shown the importance of one problem that concerns the head nurse, that of the allocation of facilities and personnel, and we will now turn and examine the importance of the passage of information for her role.

In outlining the bureaucratic system operating in the ward in an earlier chapter, we commented upon the fact that the records of each patient are placed on the chart board, and are moved from position to position as the patient progresses through the various phases of his career in the ward. In giving this brief account we ignored one link in this chain, to which we will now return. Once the record has been taken on a particular patient, it is usually placed on the desk in the nurses station, where it is examined by the head nurse, who then puts it in the appropriate slot in the board. This process is usually repeated for each stage of the patient's treatment, so that at any one time the nurse will know what is to happen next. Other ward participants are less likely to possess such information since they would not come into either direct or indirect contact with all the patients in the ward. Similarly, once a nurse has taken a record on one patient, it is unlikely that she will remain in contact with him through the stages of his career in the E.R. The physician is also only likely to come into tangential contact with him since he will be involved with other cases in the ward, and will not have the opportunity to remain with the one person for the total time he is on the ward.³

³This may not always be true, since when a "real" emergency case is brought in to the E.R., the physician may be with him for the whole length of his sojourn in the ward.

Thus, whilst the head nurse may only physically see the patient once, when he arrives, she is likely to be able at any time to tell where he is and what has to be done for him. The importance of this rests upon the fact that she is able to inform the other participants where any patient is without having to spend time going through the charts on the board.

Further, as we have noted before, the head nurse is also the first to see the patient and is, as a result, in a position to provide a crude diagnosis. This fact is crucial to an understanding of the structure of both the head nurse's role, and of the ward social structure as a whole. As we noted in the previous chapter, the physician is highly dependent upon the head nurse for the provision of this information and is willing to comply with her suggestions in this respect, even though he may not consider her fully capable of making accurate diagnoses.⁴ Since the physician is responsible for the welfare of all the patients on the ward, it is to be expected that the physician will be concerned that this informal service to him will be maintained.

Thus the head nurse derives some degree of responsibility for the patients by occupying a central position in the communication network. The information that she provides is not acquired through occupancy of the formal role per se, but involves some degree of over performance,

⁴Here we may note the example cited in the previous chapter, when the interne commented upon the supervisor's ability to discriminate between an "emergency" and an average case. Whilst he was generally critical of her ability he did not attempt to tell her this, but rather chose to complain to the observer, even though the supervisor was close at hand.

that is, it is obtained by means not specified as role obligations.

The third and final component of the head nurse's role is that of supervising the nursing staff. This is again primarily an administrative duty, which involves ensuring that they are conforming to the formal rules applying to the ward. Since the head nurse is not able to leave the desk officially, for the most part the behavior of the other personnel is conducted outside her vision, which means that the only effective way in which she can check the performance of these others is by examining the records for each patient. Given that at each point in the patient's career on the E.R. notes are recorded on the chart, which provide some rough index of what the nurse has done, then it can be seen that these provide the major insight that the head nurse has into the behavior of the nursing staff.

For example, one of the most frequent sanctions that the head nurse applies is to question someone on whether they have done something that they had been asked to do. Thus the head nurse may be able to sanction one of the nursing staff by asking, for instance, whether they have taken vital signs⁵ on a patient. In asking this question, or others like it, she indicates that either she knows that they have not been taken or that they have been taken but not entered on the chart. Thus to some degree the head nurse may exert some control over the behavior of the nursing staff and prevent any gross breaches in the formal rules.

⁵Vital signs refer simply to the recorded blood pressure, temperature and pulse of the patient.

The importance of the chart extends beyond the ward itself since, as was pointed out earlier, the chart is used to form the basis of a hospital record which is kept of the patient. Since the chart constitutes some measure of performance to others outside the E.R., there is some concern on the part of the head nurse that these will be properly completed.

Thus from the perspective of the head nurse, the chart is functional insofar as it provides her with a means for a) ensuring that tasks are performed, and b) preventing mistakes made by the nursing staff on the ward from becoming visible to other groups in the hospital. By using the chart as a check against the nurse's performance, the head nurse can achieve some control over it, even though she is not able to observe most of the behavior in the ward.

In discussing these aspects of the formal role of the ward head nurse, we have suggested that she is in a central position both with reference to the physician, and the nursing staff. We have noted that she is responsible for the distribution of ward facilities and that to a large extent the physician is dependent upon her for this. In much the same way, we have argued that the head nurse occupies a crucial position in the communication network and that she is able to provide the physician with information that would not be available to him through the formal channels in the E.R. Finally, we examined the problem of supervision and argued that the most effective form of control, that the formal ward structure allows her, is the patient's record.

However, by simply outlining these components of her role, we are not able to understand the social structure of the E.R. To do that, we

must examine the pattern of informal social relations, and see to what extent the head nurse's strategy is linked to her formal role in the ward. We will argue, as we did with the physician, that occupancy of a formal role in an organization provides the occupant with problems that have to be solved if he is to successfully meet his obligations. His strategy, or mode of adjustment to the situation, is an attempt to make these problems amenable to his control and thus predictable.

The Strategy of the Head Nurse.

Each of the three areas we have outlined with reference to the head nurse's role are important for her, since each of them can influence the degree to which she is able to effectively perform her obligations towards others in the ward. However, it must be pointed out that the problem of allocation is the most central, since upon it rests the effectiveness of the E.K. as a whole. This is not to say that the other role groups are not important, but rather to suggest that if the head nurse was not able to direct the distribution of facilities, then the ward system would most probably break down. If for example, there were not enough beds available to meet the number of patients, then the physician would be unable to conduct examinations or treatment, and in consequence there would be a feed back effect resulting in a complete blockage.⁶ Unless the head nurse can effectively mobilize facilities, then the ward would fail to fulfil its function.

⁶It should be noted here that if the number of patients becomes too large for the physician to handle, then one of the possible "safety clauses" is that the head nurse may call down one of the residents to help out.

Given this problem facing her, we find that the head nurse does in fact define it as the central one, even taking precedence over the care of patients on the ward. For example, one head nurse said to the observer, "You know, the most important thing about this job is making sure there are enough beds all the time". Or when asked if she thought the day had been a busy one a head nurse said, "Well, there have been a lot of patients in today, but we never ran short of beds". This is one of the general themes in discussions in the E.R. which tends to become more prominent as it becomes busier. Thus, as the number of patients increases, the head nurse may comment upon the fact that all the beds on the ward will soon be taken up and that there won't be anywhere to put the patients.

The same is true of the ward surgeries which may also be taken up by patients so that the physician is fully engaged in treating these and in consequence no room remains for an emergency case, if one is brought in. Thus, on one particularly busy night, one of the graduate nurses remarked that there had better not be an accident that evening since both the surgeries and the E.R. operating room were being used for suturing. Similarly, one of the head nurses told one of the graduates when the ward was busy, "I don't know what I'm going to do now. All the surgeries are being used and I've no where to put people. What will happen if someone else comes in I don't know."

Given the central importance of this problem, the head nurse is interested in allowing infractions of the formal rules if these speed up

the process of moving patients through the ward. These innovations enable her to reduce the amount of time that the physician takes treating and examining patients, and as such they may involve some delegation of authority. For example, one of the areas in which this operates is that of the procedures with respect to x-rays. Formally, it is the physician's right to decide who will be sent to have x-rays taken.⁷ However, it is usually the head nurse who suggests who will be sent, and this is done before the patient has been examined by the physician. Thus when the physician is not available, or when there are a number of patients to be seen, or when the physician is not on the ward, the head nurse may tell the orderly to take so many patients to be x-rayed, and will report this later to the doctor. The advantage of this practice is accepted by both the physician and the nursing staff, since for the former it means that he will have more information available on which to make his diagnosis, whilst for the head nurse it means that the patient will remain in the ward for less time. By sending unexamined patients to the x-ray department the head nurse is able to accomplish two things.

Firstly, by doing this she is able to make more bed space since, the patients who are in beds can be transported on stretchers, thus giving access to room that would not otherwise be available. The second advantage lies in the fact that by sending patients before they have been seen by the

⁷The exception to this practice is the case where the patient has lost consciousness at some time after an accident. Under these circumstances, the rules state that he should be sent straight for an x-ray to determine whether there is any brain damage.

physician, they will not be kept on the ward any longer than is necessary.

Thus the period in which the patient is waiting to be seen is employed⁸
"usefully".

As examples of this practice we may cite two instances, one when the physician was not on the ward, and the second when he was treating people in the surgeries. The first instance occurred one morning when the interne had not yet arrived in the ward and there were a number of patients for him to see. The head nurse sent up to the x-ray department seven people who were waiting to be examined by the physician. When the interne came into the ward the head nurse told him what she had done and he thanked her. He showed no sign of being annoyed but rather treated it as a normal occurrence. The second example is drawn from one night when it was extremely busy and the head nurse sent people for x-rays when the physician was suturing patients in the surgeries. When she informed him of what she had done he replied, "Well that's very kind of you Miss ____". Again the physician did not demonstrate any annoyance, but rather appeared to be grateful for the action she had taken. On none of the occasions when this took place did the physician appear to be irritated, let alone willing to sanction the head nurse for her usurpation of his rights.

⁸It may be seen that by sending patients for x-rays before they have been examined by the physician, the order of charts on the chart board becomes confused. Thus, although a patient may come in before others arrive, he may well be treated after them because he was sent up to the x-ray department. That is, patients may not be treated in time order of arrival in the E.R.

In other respects also, the head nurse is willing to allow infractions of the formal rules. Thus, whilst it is against the rules for the nurses to collect blood samples from the patients, this practice is generally followed and legitimated by the nurses. Taking blood samples for tests is, in terms of the formal rules of the hospital, a task restricted to two groups, the laboratory technicians and the intravenous nurses. Because it is thought that this task is one that should be performed only by persons who have been formally trained, the nursing group is excluded. However, the graduate nurses in the E.R. do take blood specimens and this is permitted by the supervisors and head nurses.

The functions of this practice are twofold. Firstly, it is again a time saving pattern in that by taking blood the nurses do not have to wait for the laboratory technicians to come down to the ward. However, this is not as important a consequence as the second one for the amount of time saved is not very great. The more significant advantage lies in the fact that it obligates the physician to the nurses. Thus, by offering to take a blood sample for the physician, the head nurse is providing a service that is beyond the prescribed range of her duties. The function of the pattern is to demonstrate to the physician that the nurse is willing to go out of her way in order to assist him.

As an example of this point, we will cite a remark made to one of the physicians who had just examined a patient on the ward and had requested that a blood sample be taken. The head nurse replied, "If I'd known she

(the patient) was staff, I would have done it for you as soon as she came in. I really am sorry, Dr. _____". Here, through an oversight, the head nurse had failed to perform this particular service, but on realizing her mistake, apologized to the doctor. It is to be noted that on this occasion the head nurse pointed to the voluntary nature of the service. That is, by telling him what she would have done, even though it was not expected of her, she indicated that it was something that could not be taken for granted and was rather, a special gesture.

A similar event took place when the interne was treating a patient in one of the side rooms. On this instance, the assistant supervisor, who was helping him, asked if he wanted to have any samples of blood taken for testing. He replied that he would, at which the supervisor started to prepare the patient's arm. Again here, the offer was made by the nurse, rather than the interne asking for it himself. Similarly, of ten when physicians ask the head nurse if she could call for a laboratory technician to get a sample from one of the patients, she would reply that they would do it themselves instead. Another occasion when this is offered is when there is a lavage to perform. The head nurse is likely to suggest certain samples that he might want taken before the physician requests her to do anything. For example, the head nurse told the interne on one occasion that there was a young child, who had taken four aspirins, for him to lavage. She asked him if he wanted her to get samples for salicylates as well as barbiturates. The interne replied that if the child has only swallowed

such a small number of the tablets, then it would not be necessary. However, a little later the head nurse told the interne that the child's mother thought that it might have taken more tablets than she had originally suspected. The head nurse then said, "we can still take the salicylates for you if you want", and he replied that it would be for the best if she did do.

In the preceding paragraphs we have cited examples to illustrate the tendency of the head nurse to go out of her way to help the physician. We have argued that the function of this pattern is to create obligations for the physician, which may be drawn upon at some later time. The head nurse, by demonstrating that what she is willing to do is beyond her duty, is able to set into operation a chain of reciprocity with the physician.⁹

However, it is possible to outline other services that the head nurse provides for the physician which are not required obligations of her role. These do not focus around any particular facility or problem area but are rather types of assistance which the nurse gives to the ward physician.

⁹ Gouldner suggests that reciprocity is both a group stabilizing mechanism and also a "starting" mechanism in social interaction. This latter function is close in meaning to our own use of the concept, since we are using it to refer to a process in which an actor creates obligations by performing some act that is not required by the person to whom it is directed, but is nonetheless valuable to him. A. W. Gouldner, "The Norm of Reciprocity: A Preliminary Statement", American Sociological Review, 25(1960), 176-177. See also, M. Mauss, The Gift, Free Press of Glencoe, 1954, chapter 4. Mauss is more concerned with the group stabilizing function of reciprocity, and as such examines the consequences of this for group solidarity.

Again we may use the criterion of normalcy to determine whether these services are expected by the physician, or whether they initiated by the head nurse.

The first example refers to an incident when the head nurse performed a test on a patient before he had been examined by the duty physician. When the man initially came into the ward, the head nurse asked what was wrong with him and he replied that he thought that he had venereal disease. She told him to go into the "small office" and asked one of the nurses to take a record on him. When the nurse had done this, the head nurse went and got some slides and took them into the small office and asked the patient if he would mind putting a smear on them. She then came out, and left the patient for a while, and later collected the slides and asked one of the orderlies to take them up to the laboratory.

Later in the day the results of the test came in and were taken down by one of the graduate nurses, who asked the interne if they were his. He replied that they were not, but at this the head nurse said that she had performed the smear. The graduate nurse commented that there was a message for her with the results which said that in future the sample should be left to dry before being sent to the laboratory. The head nurse then said, "I know _____, but I let the patient do it himself, I think he was a bit embarrassed. It saves time for the doctor though".

In this incident the head nurse had carried out this action without consulting the physician in question, and then legitimated her action in terms of the benefit it would have for him. Note also that when she

made this remark the interne was present. This particular action, though, did have a further consequence in that by taking the test herself, the head nurse was able to reduce the amount of time that the patient remained on the ward.

A similar type of behavior is that initiated with respect to cases that have to be lavaged. Once the head nurse is aware that a patient is in the ward and has taken some toxic substance, she will then delegate two nurses to "set up" the lavage. She will attempt to find out what chemical has been swallowed and then look this up in poison control manual to discover the appropriate treatment. When the physician appears at the desk she will inform him that there is a lavage for him to carry out and that a certain type of antidote should be used. Even if the physician is present when the patient is brought in to the E.R. the head nurse will not consult with him, but rather will continue with the preparation and then ask him if he would like to perform it.

Usually the physician will be told that it is all prepared for him in one of the rooms so that he need not have to wait. For example, the head nurse will say to him, "Can you do a lavage now? We've got it all set up in room four for you". Here the same theme can be discerned in the head nurse's remark. The reference to the fact that the surgery has already been prepared includes the pronoun "we", thus implying some desire to have the service performed recognized by the physician, who is the recipient.

Another example can be drawn from an instance when one of the ward clerks failed to offer to carry out a voluntary service for the ward physician. The physician had said that he would like to see the old record belonging to a patient he had just examined, but since it was not in the ward he said that he would go over to the record room to get it himself. As he started to walk off down the corridor, the head nurse went over to one of the ward clerks who was sitting by the telephones not doing anything, and said in a very quiet voice that the physician could not hear, "go and get them for him." The clerk looked somewhat abashed at this but nonetheless got up and called after the physician, "I'll get them for you, sir". The physician thanked her and then came back to the station and sat down at the desk.¹⁰

So far in this chapter we have examined one behavioral regularity that is observable in the E.R. We have not as yet attempted to explicate it although we have hinted at the notion of reciprocity. What we are attempting to understand is the willingness of the head nurse to do favours for the physician, favours which are not requested. The service in this context is a wholly voluntary act which appears to have as its manifest goal the demonstration of the nurse's high regard for the physician.

However, if we look at the central issue facing the head nurse,

¹⁰Normally, this particular type of service is carried out automatically by the clerk, and it is very rarely that one has to be reminded to carry it out.

the problem of distributing beds in the face of changing needs, we can see that the favour perhaps has an alternative function. By deliberately performing these acts of assistance and help, even when they are not demanded, the head nurse is able to demonstrate that she is willing to go out of her way for him. That is, she is prepared to carry out a wide range of favours for him, and at the same time make it obvious to him that these are not services that can be taken for granted as normal role obligations. By putting the statement, "I'll do it for you", before many of her actions which are of this type, the head nurse reinforces the idea that this is a personal gesture, and not a formal role requirement.

Thus if we examine the physician's attitudes toward the head nurse and the nursing staff of the E.R. in general, we would expect that these are favourable. In fact, this is what we do find. For example, one of the duty G.P.s said, "Oh, the girls down here are really the best, nothing is too much trouble for them". Another G.P. voiced the same sentiments when he said, "There are a lot of extremely good nurses down here, although they have lost quite a few, but I think you can say that these are among the best". An interne expressed a similar evaluation when he said, "they are all pretty helpful, like Miss _____, and most of them are willing to go out of their way for you to make things easier".

Thus the physician is aware of this aspect of the nurses' behavior and is appreciative of it. However, the principle of reciprocity implies that at some point the person who performs the initial favour may receive

one in return which is of equivalent value. The type of demand that she is likely to make of him will be related to the process of moving patients through the ward at a fast enough rate to prevent any blockages from occurring. More specifically, she is likely to request favours from the physician when the ward is busy and there is a shortage of bed space, and these will be directed to reducing this shortage.

Generally then, the head nurse will ask the physician if he will perform some task for her which he would not necessarily do on his accord at a particular time. Thus for example, on one occasion when the interne was talking to the writer in the supervisor's office, the head nurse came in and asked him if he would mind seeing some patients for her. She framed her request in terms of the fact that there were only a few patients in the ward at the time, and that it would be just as well to "get them out of the way" whilst he still had very little to do. The head nurse was able to make the request since she knew that at the time the interne was not occupied with any official duties.

At other times though, she may make these demands even though the physician is already occupied with some task. On an afternoon when the ward was busy, and the beds were taken up, the head nurse asked the physician if he could examine some patients even though at this time he was eating his lunch. He complied with this request without hesitation, and when he returned made no comment upon the incident. It may be noted that the request was made not as a formal demand, but rather as an informal

petition which he complied with as a personal favour. Her actual request, then, was made in terms of an informal obligation, and not a formal duty that he would have to fulfill.

Again, on another busy night, the G.P. was sitting writing at the small desk in the nurses station, when the head nurse walked over to him and said, "There are some people I'd like you to see sir. Could you do it now before we get any more come in (to the ward)?" The physician stood up, took the charts that the nurse was holding and replied that he would most certainly do so. He seemed willing to comply with her request although he was already engaged in writing up the diagnosis on another patient.

Generally, the physician responds on such instances without showing any irritation, even though it may inconvenience him. It is to be noted also that the patients that he is asked to see are not emergencies, rather these are ordinary cases that the nurse wishes to get out of the ward as quickly as is possible. Usually these are patients whose treatment does not take long, so that it is not too time consuming for the physician.

In these last paragraphs we have pointed to one mechanism that is deliberately employed by the head nurse to make the situation more amenable to her control. By setting into motion a system of reciprocal role obligations over and above the formal demands of the situation, she is able to mobilize the resources of the physician when ever she feels it is necessary. For the most part the system works reasonably well and conflict

and strain do not enter the picture. However, in the next chapter we will attempt to show how conflict between the physician and the head nurse has its origin in this reciprocal relationship.

In the remainder of this chapter we will examine the way in which the head nurse handles the problem of the allocation of personnel in the ward as the numbers of patients change. Here we will analyze two situations, one in which the numbers of patients are small, and when they are large.

We have mentioned before that the behavior of the nursing staff appears to be fairly automatic, and that procedures are followed without the intervention of the head nurse. Except for the fact that she tells the nurse where to place the patient, the nurse's behavior will hardly be guided by the head nurse.¹¹

In order to understand this phenomenon it is necessary to first mention something of the stratification system of the ward. Essentially the ward can be differentiated into three groups of different status. In the first of these we have the graduate nurses, nursing assistants and the head nurse, and ward clerks. This constitutes the major grouping in the E.R. both in terms of size, and status. The primary characteristic of this group is that all the members are regular and permanent participants in the E.R. and have a wide experience of work on the ward, upon which they have

¹¹This does not hold true for the periods when the students first come onto the ward. Then, the head nurse is likely to tell them what she wants them to do, and will direct them to various tasks.

developed a shared culture. The student nurses on the other hand are neophytes in the E.R. and do not acquire any status until they have almost completed their four weeks in the ward. As they progress through this period, they are gradually given responsibilities concomitant with the graduate nurses. They are put in charge of the surgeries and given autonomy on a par with the graduates.

The orderlies occupy a status that is in between that of the graduates and the student nurses. They have one claim to status, that being, the length of time they have served in the E.R., however, they have no special skills or talents that they can emphasize to improve their position.

The basis of the stratification system of the ward is twofold, that is, status accrues to those who have some special skill or training which is valuable in the ward, and who have served for some time in the E.R. and have some claim to knowledge pertaining to the particular situation. If we examine the system for any length of time we find that the relative positions of these groups shift. The primary reason for this is the fact that by the end of the period the students have acquired some knowledge of both the formal patterning of the ward and also of the shared culture. Thus by the time the formal socialization programme has ended, the student group will have attained a status higher than that of the orderly.

This can be exemplified by the following table showing the pattern of expressive interaction directed to the student nurse, and to the orderly. The table is dichotomized to show two periods, the first when the students had been on the ward several days, and the second when they

had been on the E.R. for three weeks.

TABLE

Expressive Interaction Received by Student Nurses and Orderlies for Two Selected Periods

<u>Early Period</u>		<u>Later Period</u>	
Students	Orderlies	Students	Orderlies
7	8	39	6

As a percentage of the total interaction for each of the two three-hour periods, these figures come out as:

Students	Orderlies	Students	Orderlies
5%	5%	17%	3%

From this it can be seen that whilst the amount of interaction remains about the same for the orderly, the amount received by the students increased almost three and a half times. If we may use the amount of expressive interaction received as an index of a group's status, then we may safely infer that the student's status, as a group, does increase during their stay on the ward.

Our brief discussion of the status positions of the various groups enables us to progress a little further in our analysis of the patterns of coordination employed by the head nurse.

We may briefly summarize our major finding in this area. During periods when the ward is not busy, then the lower a group's status, the more likely it is to receive commands from the head nurse. This roughly states that among the ward staff the higher a group's status, the greater

its autonomy to determine its own actions.

To exemplify this fact we may examine closely the ways in which a member of each of these groups would typically initiate an instrumental action. Thus, a graduate nurse, or a nursing assistant, would directly tell the head nurse that she was going to do something. For example, she would say that she was going to take a record on a patient, or that she was going to make up a bed. A student nurse, on the other hand, would be told by the head nurse that she would have to do something. Here also the head nurse would use a different form of address in speaking to the students. She might call them "you kids" or she might use the formal mode of address which involves calling the person by their surname, as with "Miss Stevens, can you take this up to the laboratory?" Graduate nurses would usually be called by their Christian names, and the orderlies would also be addressed in this form. However, the orderly would be far more likely to either be told what to do, or he would ask if he could do something. Thus he would come up to the head nurse and say, "Shall I take these x-rays back upstairs Miss _____?"

As the student comes to the end of her stay on the ward, she is likely to be granted more autonomy, and will carry out activities without necessarily consulting the head nurse ¹², or being told what to do by her.

¹²It is interesting to note that one group of students adopted the formal mode of address and called each other by their surnames. This was done in rather an exaggerated way so that it had the function of mocking the system in which they had such low status. It is worth pointing out at the same time that the two most prominent members of this group were generally given the least pleasant jobs to do. For example, they were generally called upon to assist at lavages, which are "dirty" operations.

See on this Goffman, and especially his discussion of treatment

For the most part then, it can be seen that coordination takes place along the lines of the ward stratification system. The higher a group's status, the greater the extent to which it can determine its own activities, and hence the more autonomy it has. Thus, graduates receive fewer orders from the head nurse than do the orderlies who are the lowest status group in the E.R.

To return to a point made earlier, it may be remembered that the head nurse was not in a position to observe the behavior of the nursing staff, since she was required to remain at the nurses station. We suggested that the only insight she received was contained in the patients' records, for by examining these she could determine what each nurse had done. This afforded her some measure of control and enabled her to prevent mistakes that had been made from becoming visible outside the ward. But the amount of control that it does give her is not very great, and this is reinforced by the fact that unlike other wards, the patient does not remain in the E.R. for any great length of time.

12 (continued) of the absent in The Presentation of Self in Everyday Life, Doubleday Anchor, 1959, pp. 170-175.

That the student nurses were given the least satisfactory tasks was recognized by the graduate nurses and the other members of this group. Thus on one occasion one of the graduates was telling the head nurse that she hated doing the paperwork associated with the job, and especially the records on patients who were to receive booked operations in the ward. The head nurse said, "we can always get the students to do those". A little later, she called over the communication system for a student nurse, and when she arrived at the desk, the head nurse told her to go and complete one of these records on a patient. This particular method of delegating tasks on the basis of status is usually legitimated in terms of it giving the person in question "good experience".

Whereas on other wards each patient would remain for a number of days, in the E.R. a patient would remain at the most a matter of hours. This means that if mistakes are made, the possibilities of rectifying them before the patient leaves the ward is slight. Thus the head nurse has to ensure that the number of errors made by the nursing staff is small, since there is not a very great possibility that these will be corrected whilst the patient in question is still in the ward.

On this point it can be noted that studies made into the affects of group climates on the efficiency of task performance have shown that the more authoritarian the group is, the greater the number of mistakes made by the members. Thus, in a study conducted by Lewin¹³, the major conclusions focus upon the amount of tension that was generated in the different groups, but it was also noted that there was a much higher incidence of careless work in the authoritarian group. At this point it must be remembered that unless the members of the E.R. are aware that this form of supervision is likely to result in a higher degree of tension and a

¹³Whilst these findings are not directly comparable with our own study, they do at least illuminate the fact that types of group structure do influence the efficiency of task performance activities. One of the major limitations of this type of study is that it does not take into account the cultural context within which it is performed.

See K. Lewin and R. Lippitt, "An Experimental Approach to the Study of Autocracy and Democracy: A Preliminary Note", in P. Hare, E. F. Borgatta and F. Bales (eds.), Small Groups, New York: A Knopf, 1955, pp. 516-523. For a discussion of similar studies see P. Blau and R. Scott, Formal Organizations, San Francisco: Chandler Publishing Company, 1962, pp. 140-164.

greater incidence of errors, then the pertinence of this hypothesis to our own study is not very great.

We have already shown that the physician holds to the view that reliance on authority leads to the emergence of hostility directed toward him by the nurses. However, it is necessary to demonstrate that the nurses also hold the same belief. Here, however, we have very little evidence, but what we do have does tend to support this hypothesis. Thus, for example, one of the graduate nurses said that if the head nurse becomes critical of those under her, then they are likely to become nervous. Similarly, one of the ward clerks said, "if the head nurse gets irritated or jumpy, then everyone else does too, and then you just try to keep out of her way."

Thus if the head nurse is aware of these consequences of applying "close supervision", then she is likely to avoid using it as a means of control. The method she is most likely to use is one that will obligate the nurses to her, so that they not only have an impersonal obligation to her, but also a personal loyalty. This is a procedure that is general in organizations, and can be employed without risk by the supervisor.¹⁴

In her relations with the ward staff, the head nurse tends to follow a policy of allowing infractions of the rules in some areas, whilst strictly enforcing those in others. Thus one prominent pattern is that in

¹⁴For example, see P. Blau's study, The Dynamics of Bureaucracy, in which he discusses the ways in which new incumbents of authority roles attempt to strengthen their positions. See also for a more detailed study of this process, A. Gouldner, Patterns of Industrial Bureaucracy, *passim*.

which she allows the nurses and other members to break rules pertaining to the consumption of soft drinks during working hours. For example, rules prohibit the drinking of any substance excepting water, at any time other than during scheduled coffee and meal breaks. However, this rule is not followed and instead nurses and orderlies help themselves to coffee, and other drinks, and consume them quite openly before the head nurse or supervisor, in fact usually the latter two will indulge in the same practice with the others. The supervisor made this legitimate by telling one of the nurses that she did not mind as long as they hid the cups if one of the personnel from the nursing department approached.

Thus often when the ward is not particularly busy, the head nurse will ask one of the students or graduates if she will get her a coke from the machine in the next corridor. This will herald a redefinition of the situation, from one in which formal rules are adhered to, to one in which the participants settle down to an unscheduled break. But even if the change is not marked by an action of the head nurse, evasion of the rule is still permitted, and it is not unusual to find one of the nurses pouring herself a cup of coffee and taking it into the utility room where she can drink it out of "official" sight, but within calling distance of the desk in the station.

Similarly, with respect to smoking, several areas are regarded as legitimate places where a member of the ward staff may indulge. Thus the lavatories, the supervisor's office and the utility room are available for

those who wish to smoke, provided they do not do it too openly and thus
necessitate some action being taken.

Certain other practices have a similar function. For example, by allowing nurses to take blood from patients, when this is a formally prohibited practice, the head nurse is communicating something about the competence of those in her charge. Thus, by making this legitimate for nurses on the ward, the head nurse is in effect saying that she thinks that they are more capable than they have been officially defined. This is recognized by both the supervisor and head nurse, and by the nurses themselves.

The supervisor said to the observer on one occasion that the formal rule existed because there was some degree of risk attached to taking blood but she also said, "but we let the girls do it because we think that they are capable". The nurses similarly think that it is a mark of their status not simply as individuals, but also as members of the ward. Thus one nurse compared the E.R. staff with the laboratory technicians saying, "If they can do it, I don't see why we shouldn't". Another nurse demonstrated feelings of frustration when she said, "In all the other hospitals I've

¹⁵Bensman has noted that illegal practices may be tolerated by supervisory staff, provided that they are not performed in such a way as to make a reprimand necessary. Even where a reprimand is given, this is, Bensmal suggests, more of a ritual than a serious attempt to sanction a deviant. The same thing is true on the E.R. If one of the nurses were to drink a cup of coffee in front of a visiting supervisor, then the nurse would be sanctioned, since in allowing the nurses a certain amount of latitude, the head nurse at the same time obligates them to support her. This in turn means that they, the nurses, will not put her in any position which could be compromising. See J. Bensman, "Crime and Punishment in the Factory: A Functional Analysis", in Mass Society in Crisis, Rosenberg, Gerver and Howton, (eds.), The MacMillan Co., New York, 1964; pp. 141-152.

worked in I've been allowed to do it, I can't see why they don't allow it here. Its not as though the people are any less capable". Certainly this practice is restricted to the graduates, and as such it has the further function of reinforcing their higher status over the students and the nursing assistants, but nonetheless, its value to the nurses is greater than this since it raises the status of the ward as a whole.

The functions of this method of allowing evasions of certain of the formal rules applying to the ward, extend further than matters of status. By allowing this to take place, the head nurse is mobilizing loyalties that can be called upon for her own benefit. Thus, from the perspective of a nurse, the reason why something is done, may be as much the fact that she feels that she should do it for the head nurse, as the fact that she may be sanctioned if she does not do it. The nurse may feel that by not doing something she is failing in her loyalty to a friend.

At the same time, there is always the possibility that the balance will be tipped too far in the direction of informality, so that the task performance element may become of secondary importance for the staff. Thus, some form of control must be exerted to ensure that leniency does not reach the proportions of complete informality. To do this the head nurse employs a system of sanctioning which is composed of two elements.

Firstly, sanctions are imposed in areas where there is little danger of offending or of endangering the motivation of the participants. For example, the head nurse always upbraids nurses who fail to remove the yellow

sheet from the patient's record. This has no instrumental significance, but rather is a relatively unimportant item of ward procedure. By calling nurses to the desk and publicly pointing out to them their error, the head nurse is able to remind the participants of her authority. That is, she is able to warn them of the consequences of making a serious error by jokingly indicating to them that she has authority which she is willing to use. This whole procedure has more of a ritual quality to it, than appears at first sight, since, the other graduate nurses, if they are at hand, will usually join in and jokingly "denounce" the deviant. However, to say that this is simply an occasion for mocking the formal system would be to ignore the fact that an error of this sort is always corrected, and further to ignore the fact that the culprit is always called to the desk to receive her "punishment". If this was simply a socio-emotional ritual, it is not likely that it would be allowed to disrupt the task performance activities of the ward members. As it is, though, the offender is always called to the desk by the head nurse if she is not engaged in an activity that she could not leave, and even if she is so engaged, she will be told of her misdemeanor at some later stage.

The function of the second pattern is much the same, although it centers around those mistakes which could have more serious consequences for the ward. Where these occur, they are always treated as if they resulted from ignorance on the part of the actor. Thus, the head nurse will explain to the offender why she should not have done it and will draw out the

implications of making such a mistake. For example, on one occasion, one of the nursing assistants, who had been on the ward for some time, gave a patient who had just had an operation a glass of orange juice, since the patient had complained of a dry throat. The patient as a result was sick. The nurse communicated this to the head nurse who asked her if she had given the patient anything. When she explained, the head nurse did not show anger, but rather started to enumerate the reasons why patients should not be given liquid to drink immediately after an operation.

Another incident involved one of the student nurses who had gone into a room to take the blood pressure of a patient who had been raped. The student had done this of her own volition and when the head nurse discovered this, she called the student to the desk and asked her what she had done in the room. The student replied that she had been taking the woman's blood pressure. The head nurse then told her that students were not supposed to have anything to do with rape cases since they were not able to testify in court.¹⁶

Here again, the deviance was treated as if the person in question had no idea that she was committing an offence. The sanction was muted by the practice of explaining the reason why this was an offence. In

¹⁶Because they have not finished their training, student nurses are not thought to be competent to give medical evidence. Thus in such instances only graduate nurses are allowed to be present to carry out the necessary assistance to the physician.

other instances also no attempt is made to remind the offender that she is at fault, rather the head nurse attempts to give the rationale for the rule involved. Another example involves one of the nurses not taking proper precautions when dealing with patients. The head nurse called for one of the nurses to come to the desk and asked her how she had allowed herself to get bitten by a young child. The nurse replied that she had been trying to hold the child's mouth open so that she could pour something in, when the child had snapped it shut. The head nurse then said jokingly, "That's one of the occupational hazards of this job, you get bitten in the line of duty". She then went on to say, "Seriously, you must be careful not to let that happen again. You could get a bad infection from it." The referent in this incident was not the rule, but rather the consequences that a mistake could have for the perpetrator.

So far in this section of the chapter we have examined the problem of coordination as it is handled by the head nurse in periods when the ward is not busy. We have suggested that she follows a pattern in which certain rules are avoided in order that she can call upon the loyalty of the nurses as an insurance against their deviating in some other more important area. However, we have argued that to prevent the situation from being taken for granted, the head nurse employs certain methods of control which do not offend the staff. We pointed to the function of always correcting infractions of unimportant rules and further suggested that where deviation occurred in an area of some importance to the head nurse, she would formulate the sanctions she applied in terms of the deviant's ignorance. Thus,

the offender is made aware of the head nurse's authority, but at the same time spared the full effect of it.

We must now turn to the problem of why this system breaks down under conditions when the ward is busy. One of the features of the method of control employed in the slack periods was that the head nurse did not attempt to order the participants to do things. Rather she allowed these to carry on their own activities as they felt necessary. Thus, she would not tell a nurse to take a record, except if this were a student who was new to the ward, but would allow the nurse in question to do it of her own accord. However, if there was something that she wanted done quickly, she would tend to call for someone to come and do it.

As the ward becomes busier though, the nurses are more likely to be involved in activities away from the nurses station, and in consequence out of sight of the head nurse. As the number of patients increases, the amount of information that the head nurse needs to assimilate also grows, so that the problem of remaining aware of the various activities that are going on in the L.R. takes on an increasing importance for her.

As patients are coming into the ward continuously, there is always need for a nurse to take records, to provide medications, to aid the physician, to make up beds, to clean and prepare the surgeries and to do all the other necessary tasks. Under these conditions there is a greater possibility that some important task may be not be attended to, since the nurses are away from the desk and thus not in possession of the

knowledge of what is being done at the moment and of what needs to be done.

In this situation the head nurse attempts to centralize control, that is, she attempts to take over control of the activities of the staff by delegating them tasks. Thus the situation involves a shift from a decentralized to a centralized authority structure, in which coordination of activities is directed by the head nurse. The reason for this shift lies in the question of the amount of time available to the head nurse. As the pressure on the ward facilities increases, the amount of time available to the head nurse diminishes. Thus she has to ensure that patients are moved through the ward at a fast enough rate to prevent the facilities from becoming immobilized. To do this she proceeds to make explicit demands on the nursing staff since she is the only member of the system who is in possession of information on what needs to be done.

Thus, as the head nurse comes to face this situation of increasing patient pressure, she must attempt to direct the activities of the other staff members. For example, if she wants a graduate nurse to carry out some form of medication on a patient, and there is no one available at the desk, she is likely to call for someone to come to the desk over the communication system. At such a time the probability of the nurses already being engaged in some activity is quite high, so that the head nurse is not likely to get an answer. Thus, she will then start asking what each of them is doing, and in consequence the nurses will find themselves subjected to a pressure to relinquish some of their autonomy.

If the head nurse is unable to find someone to carry out the task, she is likely to perform it herself, since this saves time. But by doing this she is likely to lose some of her control, since if this involves her leaving the desk, as when she takes a record on a patient, she will not be present when any new information comes into the ward. For example, when one of the head nurses left the desk in one of these busy periods to take a patient to the x-ray department, information arrived from the laboratories which was attached to the patient's charts by the ward clerk, and placed on the desk. When the head nurse returned, the clerk was herself taking a record, so that she did not have an opportunity to inform the head nurse that the results had arrived. A little later the physician came up to the desk and asked the head nurse if the results had come in on the patient. The head nurse then phoned the laboratory and was told that the results had already been sent down. Thus, when the ward clerk appeared at the desk the head nurse chastized her for not informing her that the results had already come down.

Other "breakdowns in communications" may arise from the fact that as pressure develops on the ward facilities, the head nurse may delegate ward clerks to start performing other than their normal duties. Thus clerks may be asked to make beds, show patients to other parts of the hospital or take records. But by doing this, no one may be left at the desk to answer phone calls, and other personnel may be diverted into performing routines that are typically the ward clerk's.

Thus far we have indicated three typical processes that occur as the ward becomes busier. 1) The head nurse starts to delegate tasks to ward members and centralizes control. 2) The head nurse leaves the desk to perform tasks that are more properly carried out by other personnel. 3) The division of labour between the various categories of ward personnel breaks down. Each of these involves an idea of attempting to keep the ward facilities "fluid" , that is available for adaptation to a changing situation. Thus the head nurse's concern is to see that the staff are never committed to one task that would not allow them to take up some other more important activity which might arise.

In this situation, the head nurse starts to centralize control in order to acquire better information on what is going on in the ward. This entails some degree of close supervision, since she is concerned that the nurses do not spend any more time than is necessary on a given task. Close supervision entails two components in this situation. Firstly, it refers to the process of checking intermittently, to discover whether or not a person has finished doing a specific task, and secondly, it involves some degree of primary face to face contact between the nurse and the head nurse. Thus, this differs from the normal ward situation in that the process of checking involves some face to face contact so that the person knows that she is being checked on.

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In the normal situation , whilst the head nurse still checks on

¹⁷By normal we mean the statistically most frequent occurrence. Under this definition, the normal situation is the one where there are relatively few patients on the ward and little pressure on ward facilities.

the ward members to ensure that they are not making mistakes that could have repercussions on the ward, this does not proceed on a visible level. The nurses are unlikely to know whether at any time the head nurse is scrutinizing her work. However, as the situation becomes busier, the process of checking becomes more visible, and thus power relations become more

clearly defined.¹⁸ Thus in comparison to the normal situation, the nurse is likely to feel more resentful of the head nurse's actions, since these communicate an impression that she is not wholly capable of performing her obligations. Thus, the more the head nurse attempts to control the nursing staff, the more likely they are to resent it and show their dissatisfaction.

By doing this, they create an uncertainty for the head nurse in so far as she becomes unsure if they are willing to fully perform their role obligations. To overcome this difficulty, the head nurse engages in further close supervision and starts to leave the desk to ensure that her directives are being properly followed. This in turn means that she is less likely to retain control over the flow of information in the ward. This happens

¹⁸In Gouldner's model of the close supervision process, the initial condition is the perceived low performance of the participants. Our model is not concerned with this element since it is not felt to constitute an important component in the situation. However, Gouldner shows that to validate his position, the supervisor uses the formal rules as a justification, but by doing this the power relations in the situation are made more visible thus creating a new tension .

See A. Gouldner, Patterns of Industrial Bureaucracy, The Free Press of Glencoe, 1964; pp. 176-180.

because the head nurse, by leaving the desk, cuts herself off from the new information coming into the ward. This reinforces her tendency to check on the nursing staff, in that by doing this she strengthens her control over the other ward participants, and thus reduces their autonomy.

The whole process of coordinating the activities of the members of the ward during the busy period then, tends to form a "vicious circle",¹⁹ in which the problems confronting the head nurse are magnified by her own actions. In a further attempt to overcome the problem, the process of de-^{19a}differentiation is introduced. This means that the boundaries between roles are broken down so that people from each category perform activities that are more properly the obligations of others. For example, the ward clerk is asked to make a bed, whilst the head nurse attempts to answer telephone calls as well as perform the other aspects of her role.

The consequence of this is that information ceases to flow properly, so that the head nurse is not in a position to know who has certain information. Thus, she is forced to attempt to check further to discover the source of information and its reliability.

We may exemplify this over all process by an illustration from a

¹⁹See on this, March and Simon, Organizations, John Wiley and Sons, Inc., 1958, Chapter III.

The idea of the vicious circle in organization analysis rests on the concept of remedial measures reinforcing the original cause for introducing them. Thus in Gouldner's example, the supervisor, by employing close supervision, made power relations visible, and thus offended the norm of equality. This led to a reduction of the worker's motivation, thus strengthening the supervisor's belief that close supervision is necessary.

^{19a}. A. Gouldner has used this concept to refer to that process in which a social system moves from a high to a lower level of complexity. In our usage dedifferentiation does not refer to complexity, but rather to the disappearance of role boundaries. See his article "Reciprocity and Autonomy

particularly busy evening shift. As the head nurse became aware that the number of patients was growing and that the number of beds available was decreasing, she started to call over the communication system for a nurse to come to the desk. When after a few minutes no one had appeared, she called for one of the graduate nurses by name. The latter replied by asking what she wanted and the head nurse responded by asking in turn if she had taken the hemoglobin on the patient in room 10. The nurse then asked which patient the head nurse was referring to and was told that she was to do it on the person in bed one. The nurse replied in an irritated way that she had already done that. The head nurse responded by saying, "let's have less lip _____".

Later, when the head nurse tried to get one of the nurses to take a patient to the x-ray department, they were all busy so she went off and did it herself without leaving anyone at the desk. During her absence, one of the patients was admitted to the hospital by the duty G.P. When the head nurse returned, she started checking through the charts and asked the ward clerk if she knew where the patient's record was. The clerk said that she did not know but one of the student nurses commented that she had been admitted by a graduate. At this the head nurse started phoning the other wards to find out which ward she had been sent to, and who had authorized it. Eventually she found that the duty G.P. had ordered it, and that the mistake had occurred because the nurse involved had not written out the form for admittance correctly. During this incident the head

19a. (cont'd) in "Functional Theory", in L.L. Gross (ed.), Symposium on Sociological Theory, Evanston, Illinois: Row, Peterson and Company, 1959.

nurse was becoming visibly more annoyed, whilst the nurses appeared to be less than comfortable in the situation, and made such comments as, "I wish someone around here knew what was going on" and "I just want to get out of here as soon as I can tonight".

In this climate the possibility of being criticized becomes greater and in consequence the actors tend not to bring up their own shortcomings for fear of being criticized before other members of the staff. For example, the head nurse asked two of the student nurses to set up a stretcher in one of the rooms and then asked one of them if she knew how to do it. The student replied that she did not, at which the head nurse turned to the second and said, "Well, you should, you have been nodding your head all the time I've been talking". The students did not say any more, but about five minutes later they came back to the desk and said that they did not know how to get the sides of the stretcher to go up, nor could they get it to tip. The head nurse looked quite annoyed at this but before she had a chance to say anything, another nurse said that she would show them and they went off to the surgery.

A further consequence of this process is that the participants become more cautious in their approach to the head nurse. Thus whilst they may be told to do something by her, before they actually do it, they will confer with her. This is in a sense self defeating since by not taking responsibility for their own actions they reinforce the head nurse's conception of their inadequacy. Thus for example, the head nurse asked the clerk to make a phone call and as the clerk started to dial the number she enquired,

"You did ask me to call ____?" This elicited a reply from the head nurse, and also an expression of derision. A little later she questioned the clerk to find out whether she did make the call or not.

We can now outline the whole process as it occurs during periods when there is pressure on the ward facilities. Firstly, the head nurse starts to centralize control by issuing directives to the various participants. By this means she makes possible some degree of fluidity of the facilities, so that as various needs arise, she can allocate her resources to meet them. In order to ensure that her resources, in this case the staff, are being used to the best extent, she initiates a policy of checking on them. This in turn creates some resentment among the nurses who feel that their competency is being called into question. This resentment is voiced either verbally or by gestures and expressions, and thus produces some uncertainty for the head nurse concerning their motivation in the situation. Her uncertainty in this respect reinforces her desire for control, and thus reinforces the resentment that it was designed to halt. The more that she resorts to techniques of close supervision, the less likely she is to retain control over the flow of information, and in consequence, the more likely she is to attempt to remedy the situation by further centralization and role de-differentiation.

The situation thus becomes more unstable as the demand for beds on the ward grows. The instability develops from the uncertainty facing the head nurse with respect to the flow of patients, and as this is of crucial

concern to her, she must attempt to make adjustments as the situation changes. Formal rules, in this situation, do not provide the participants with a "working model" of how to adjust, rather, any attempts at controlling and coordinating the behavior of the ward staff must be made on an ad hoc basis. However, as the head nurse attempts to increase her own authority in the situation, she is likely to bring into effect a reaction which will impede the effective organization of ward activities.

Given that this "vicious circle" results from the attempts at adjustive behavior by the head nurse, it is still necessary to ask why the circle does not continue to reinforce itself until the participants come into open conflict or withdraw. ²⁰ The main reason lies in the fact that we are dealing with a type of organization in which there is a high degree of emphasis on commitment to the goals. In Etzioni's terms, this is a ²¹ "moral" organization type in which motivation derives from identification

²⁰Where conflict does occur it is most likely to take place between the head nurse and the orderly, since the head nurse can more easily sacrifice his participation in the ward. The head nurse is less willing to risk conflict with the graduate nurses because their withdrawal would effectively bring the ward to a halt.

It would appear that criticism of the orderly and open conflict with him may have the latent function of recreating some degree of solidarity, since on occasions where this did occur, the other nurses tended to join and give support to the head nurse.

²¹See A. Etzioni, Complex Organizations, The Free Press of Glencoe, Inc., 1961, esp. Chapter 1.

One area in which the application of Etzioni's typology may prove to be useful, is in the analysis of the extent to which organizations can tolerate internal strain and conflict.

with the goals of the organization. This is true to the extent that the participants had internalized the goals of medicine and identified with their occupational role, but for some it would be true to say that they had also identified with the ward as a sub-unit of the hospital. Since the nursing staff were involved in the practice of professional activities with which they identified, they were willing to continue conforming even when the situation became tense and punitive.

A further reason why the social structure did not break down completely under the strain was the fact that friendship relations crosscut authority positions, so that the head nurse was in a position in which she had to exercise her authority over friends. Since on any shift, the number of persons on duty would be quite small, all the members would know one another. This means that the nursing staff would be willing to remain in the situation under these conditions of conflict and tension because of their friendship with the head nurse. Thus the loyalty of the staff to the head nurse derived from the informal relations that had developed in the E.N. and which crosscut authority lines.

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²²S. M. Lipset, M. Trow and J. Coleman discuss the effects of size on a group's ability to withstand conflict. Our point here is slightly different in that we are concerned with the consequences of conflict, deriving from close supervision practices, for a group where informal ties create obligations over and above the formal arrangement of rights and duties.

See Union Democracy, Anchor Books, New York: Doubleday Co. Inc., 1962; pp. 170-172.

Summary

In this chapter we have been concerned with analyzing the problems inherent in occupancy of the role of head nurse, and the means with which the head nurse attempts to overcome these. We suggested that the crucial problem facing her was that of the allocation of facilities, especially rooms and beds. Since the head nurse is unable to predict the numbers of patients who will come into the ward at any time, she must make adjustments to the situation as the need arises. Thus we argued that the head nurse would go out of her way to create obligations that she could call upon when the situation became more pressing. For example, we suggested that the head nurse performed all manner of services for the physician which were not specified role obligations. However, at a later time when the pressure on ward facilities was greater, the head nurse would then ask the physician to pay off his obligations to her in the form of seeing patients when she asked. We argued that this system worked quite successfully when the ward was not too busy, and that the physician did not in any way appear to resent the fact that the head nurse was initiating action for him.

The second area we were concerned with was that of coordination of personnel in the E.R. Here we analyzed two situations, the normal, when the number of patients does not create problems for the head nurse, and the busy period, when ward facilities become scarce. In the first of these, we argued that the head nurse granted considerable autonomy to the nurses in terms of the direction of their activities. We noted that the head nurse allowed infractions of certain rules in order to create ties of an informal nature with the nursing staff. By building up these informal

relations the head nurse was able to ensure that they did perform their role obligations even though the only means she had of checking on them was by means of the charts. However, to ensure that she retained some measure of control, the head nurse tended to enforce certain rules which, it was argued, were not crucial for the achievement of ward goals.

In the busy period, the need for coordination of activities to meet changing exigencies, results in the head nurse attempting to centralize control over other members of the staff. This, we showed, entailed the introduction of close supervision measures which had the function of reinforcing the head nurse's problem of coordination. We argued that this vicious circle effect was contained in the E. R. by two factors. Firstly, the commitment of the nurses to the nursing profession and also to the ward itself, and secondly, the fact that friendships built up in the ward functioned to prevent the strain from reaching the proportions of a total breakdown in the ward structure.

In the next chapter we will consider the relations between the physician and the head nurse during periods when the ward facilities are becoming strained. We will consider the reasons for the fact that the relations become more conflictful, as the situation becomes busier, and that definitions of the physician change depending upon the situation.

CHAPTER 5

SOURCES OF TENSION AND STRAIN IN THE WARD

CHAPTER 5

Conflict in Strategies

In this chapter we intend to examine the relations between the head nurse and the physician under conditions when the ward is faced by the problem of assimilating a large number of patients. In a previous chapter, we examined the pattern of relations that exist during periods when there is no strain on the ward facilities, and showed how certain mechanisms tended to enable the participants to make adjustments to the situation. One of these mechanisms was the development of reciprocity between the head nurse and the physician, which enabled both to rely on the continued support of the other. The problem we will discuss in this chapter will be to analyze under what conditions this pattern of reciprocity ceases to function.

In analyzing the physician's mode of adjustment to the ward situation, we argued that with the redefinition of the ward's function, the physician no longer has to deal exclusively with emergency cases. Rather, as the ward becomes more like a general clinic, he comes into contact with illnesses that are not in need of "urgent" treatment. One consequence of this is that the physician is no longer quite so limited in the amount of time that he has to diagnose and treat patients. Given this fact, we argued that the physician acts to maximize the amount of certainty he has about the causes of the patient's illness and the necessary type of treatment. Thus we suggested that a more appropriate adjustment to the situation involved deliberation rather than "decisional urgency".

One item of ward equipment functions to protect the physician's right to take his time in ascertaining the causes of the patients' illnesses, and that is the chart board. This device is so arranged to allow the physician to determine his own pace of work, since each of the patient's charts are placed on it in the order of their arrival. The physician is then able to determine the length of time he can spend on each patient in terms of the needs of each, rather than of the other participants in the ward. The board may be said to have a secondary function which is to prevent the physician from having low status actors initiating action for him.

The changing function of the E.R. has had the consequence of providing the physician with a greater amount of time in which to act. Similarly, the development of paramedical services, such as the laboratories and x-ray facilities, has meant that the physician may make diagnoses with greater certainty. The costs of achieving this certainty, have been mainly in terms of the amount of time consumed on each patient's case. However, it would appear that given the fact that medical uncertainty is frequently confronted by the physician, the cost of making these tests is less than the risk involved in not making them.

In discussing the physician's role in the ward, we noted that since his was the responsibility for the patients on the ward, he had an interest in acquiring enough information to make reliable diagnoses. But this, as we have suggested, takes time, which may be in short supply. The reasons for the shortness of time lie in the nature of the interests of the head nurse in the E.R., who is concerned with ensuring that enough beds and

surgeries are available in the event of an emergency case arriving. Thus as the ward becomes busier, the head nurse starts to make increased demands on the physician, which conflict with his strategy of maximizing the amount of time he takes with any patient.

At this point it is necessary to ask two questions before proceeding in the analysis. Firstly, how is the head nurse able to undertake the policy of forcing the doctor to work at a faster pace? And secondly, why does she choose to do this to the physician when other factors are more properly the crucial ones that could be manipulated to reduce the pressure on ward facilities?

To answer the first question involves returning to an earlier discussion. It may be remembered that in the E.R. the physician was not in a position to know what was wrong with most of the patients that come into the ward until he examines them. However, this creates the possibility that a patient could be brought into the ward and not be seen by the physician even though he is gravely ill, until his chart reached the first position on the chart board. To counteract this from happening, the physician relies upon the head nurse to make a rough diagnosis of each patient who comes into the ward.

This in effect means that the head nurse is in a position to specify when the physician should see a patient, and when he should temporarily abandon the principle of treating patients in order of their time of arrival. The routine of the chart board can be bypassed then, at the discretion of the head nurse.

This however, sets a precedent in that it legitimates the head nurse's right to do the same thing on other occasions, when the medical grounds may be less strong. Thus, the head nurse may ask the physician to alter his own work pace in order to do something that might not be in his immediate interest. For example we have seen that the head nurse may ask the duty physician to forego some activity in order that he might examine certain patients who remain in the E.R. and who would not otherwise be seen until some time later.

The right to initiate action for the physician derives, then, from the fact that to do so may on certain occasions be in his interest. But it is further reinforced by the fact that the physician is obligated to the head nurse for the assistance that she gives him which is not a part of her formal role. As we have noted before, the ward physician is willing to do "favours" for her because he is involved in a set of reciprocal role relations with her.

It can be seen then, that, given the fact that the head nurse exercises this right in circumstances when the physician approves of it, if he refused to grant her legitimacy in other circumstances, she might in turn withhold the informal assistance on which he depends. If, for example, the head nurse requested that he see several patients, and he refused, she could in return withdraw her support, which would make his job more difficult to perform.

Thus the physician may comply with the requests of the head nurse even where these are not in his immediate interest because by not doing so he runs the risk of retaliation, which would be highly dangerous.

In the E. R. the major cause of the head nurse's problems center around the difficulty of getting beds on other wards to which she can send patients who have been officially admitted. The difficulty arises from the fact that since the number of patients who may come into the E.R. is unpredictable, the hospital cannot afford to keep a large number of beds available to cover this possibility at all times. Thus the staff often find themselves in a situation in which they are unable to find room on other wards to accommodate the patients who have been admitted from the E.R.

For the head nurse, this represents one area in which she has very little control although it is crucial to the E.R. If she is unable to find beds on other wards, she faces the possibility that she will not have any space in which to place either any more patients who come in, or an emergency case who needs immediate treatment. But availability of beds, rests in the hands of persons, mainly other physicians, who are motivated by their concern for the health of their patients, rather than by any interest in the difficulties faced by the emergency room staff.

However, there is one way in which the head nurse does attempt to intervene and that is by having information concerning bed space on other wards transmitted straight to the E.R. Normally such information is sent to the Admitting Department, who are then able to give permission either to the E.R., or to private practitioners who wish to have their own patients admitted. Thus, since G.P.s also make claims on the same bed space, the head nurse attempts to have the information relayed directly to the E.R., rather than through the Admitting Department. That is, she

attempts to set up an informal communication system by which she is informed prior to the Admitting Department about vacancies.

The means by which she does this are limited, since the E.R. is formally linked to the other wards by a relationship of dependence. Other wards satisfy a crucial need for the Emergency Ward, the provision of beds, whilst the E.R. does not perform any equivalent function for them. Thus, in order to acquire the information, the head nurse must carry out some service in return.

The types of service that can be provided are of necessity peripheral to the needs of the other wards, but at the same time, they must appear to be of some importance in order to ensure that some gesture of reciprocation will be made. Thus, for example the head nurse may legitimate her actions by saying that it will be of "some help" or that it will save the other ward some trouble. The head nurse on one occasion sent a tube of blood, that she had specially taken, to another ward with the patient, and told the orderly who was taking him, "it will save them time up there".

Similarly, failure to perform this "extra" service may endanger the informal relations between the wards. Thus, when the head nurse had a patient sent straight up to a medical ward after he had been admitted, and did not attempt to clean him or make him presentable, she repeatedly stated that she was worried about the reaction that this would receive. When the orderly returned from the ward, she asked what sort of reception he had had. When he said that they had been extremely annoyed, the head nurse said that they had better phone the ward and apologize and try to

restore good relations with them.¹

But the ward is not in a particularly strong position vis a vis the other departments and their ability to influence the processes of discharging and admitting patients is only slight. This is brought home to the E.R. staff in cases when they offend another ward. For example, the head nurse received information that a bed was available on one of the wards, which meant that they could move one of their own patients out of the E.R. However, the information that they had received had been false, and in fact the bed was not to be vacated for some time. By the time this was discovered, the supervisor from the other ward involved, came down to the E.R. and proceeded to angrily criticize the head nurse for having sent the patient up, before they had been told of any vacancies. The head nurse explained that she had been informed that there was a bed available, and this somewhat mollified the supervisor.

The point here was that the participants in the E.R. were reminded of the weakness of their claims on other wards, since the other wards would be willing to apply quite harsh sanctions openly on them. But nonetheless, by attempting to offer some service to the other wards, they increased the probability that they would be informed of vacancies through the informal channels.

¹It has been noted that the movement of patients between wards in hospitals has a special significance for the participants, in that the appearance of the person who is moved, gives the receiving group an insight into the type of care provided on the ward he has just left. We feel that whilst this may be true, it must also be remembered that whether a patient is clean or not when he is moved, has some bearing on the amount of work that must be done on the patient when he is received. See on this, R.K. Crook, "Role Differentiation and Functional Integration: A Structural Model of a Mental Hospital", Unpublished Ph.D., Princeton, 1963.

Thus, attempts to increase the amount of control over the availability of beds, were essentially unsuccessful. The only area in which the E.R. had some influence, was in that of the transmission of information, which in itself was not very important.

But in other respects also the ward staff were equally unable to control vital services performed outside of the ward. With reference to the x-ray department, they exercised no control over the pace at which x-rays were taken, processed and read. The fact that they were powerless in this respect, had an influence on their attitudes towards this department, which played such a crucial role for the E.R. Even though they were aware of difficulties that faced the x-ray department, difficulties which arose from a lack of staff and the fact that it was undergoing major reconstruction, the E.R. staff were highly critical of the service given by them.

Insofar as the length of time expended in taking, developing and reading the plates to a large extent determined the patient's stay in the E.R., it can be seen that this constituted a factor of vital importance to the staff. Thus one of the most frequently heard questions in the E.R. was "what are they doing with those people up there, they've been up there for hours now and we haven't had a single result?" In part the ward staff were concerned about this not simply because it meant that each patient would remain on the ward for a longer time than was thought necessary by them, but also because they felt that the patients would be more likely to complain under these circumstances, and it would be their responsibility to justify the long waiting period. This in fact did happen, and more than once the nurses would be faced with the problem of explaining to an irrate

patient the reasons why they were having to wait so long.

However, the fact that the X-ray department did exercise such influence in the activities of the ward, can be seen as one of the contributing factors to the hostility of the nursing group toward them. It may be noted that the same attitude was also directed toward the laboratory technicians. Here again, the rate at which tests would be carried out, did not depend upon the actions of the members of the E.R., rather the major controlling factor was the technological system of the laboratory. This too came under criticism from the nursing group, who felt that the technicians were not working as fast as they could. To remedy this, they tended to label most of the tests they had taken, "stat". This in effect means that it should be carried out as quickly as possible, but as one nurse noted, "it's a terribly overused term down here, (the E.R.) and it really doesn't mean anything any more". Thus by consistently demanding that tests be performed "stat", the value of the term became debased, so that its use did not elicit any faster service, even where this was technically possible.

In looking at these crucial factors in the ward's social environment, it may be seen that the E.R. is to a large extent dependent upon the provision of certain crucial services, which lie outside of its control. Thus, in conditions when the ward facilities become strained, the head nurse is unable to alleviate the difficulties by drawing upon the support of outside groups.²

²Presumably there are limits on the degree to which departments outside of the E.R. would be willing to make sacrifices for it. For example, it might be expected that other wards would give assistance during a community disaster, when the E.R. would not only be handling large numbers, but also would have little time in which to do so. In this type of situation, the motivation for other departments to make sacrifices, would derive as much from the fact that the effectiveness, and hence the legitimacy, of the hospital was being tested, as it would from the participants' commitments to the goals of medicine.

The social environment of the E.R. then, is not available for manipulation by the E.R., and as a result the head nurse, in order to reduce the amount of time spent on the ward by each patient, is forced to increase the work pace of those within the ward boundaries.

In this light, the physician appears as the obvious element in the situation that can be pressured into working harder, and taking less time with each patient. Thus one head nurse said to one of the residents, whom she had just called down to the E.R., "Thank you very much sir. I'm sorry to have had to call you down, but I do believe in using my resources as best I can." This statement, made on a busy evening shift, reflects the head nurse's concern with the elements in the environment as resources which can be employed to achieve her goals in the ward, even though this may produce criticism from others in the E.R.

Thus, it may be seen that whilst factors external to the ward are crucial to its operation, these are not amenable to its control. However, from the head nurse's perspective, the most important factor in the situation is the physician, since he is able to change his work pace, and is also dependent upon the head nurse and hence less resistant to her efforts at direction.

Under these conditions the relations between the two are more tense since the physician is in a position in which he has less autonomy than he is accustomed to having. Whilst the physician is concerned with not having to rush over his decisions, made with respect to patients, the head nurse is directly interested in ensuring that patients do not remain on the ward for any great length of time. This results in her taking two types of steps

which are aimed at getting the ward physician to work at a faster pace. Firstly, she starts initiating action for him on a fairly regular basis, and secondly she attempts to prevent him from using beds for any great length of time.

With respect to the first of these strategies, we can draw on examples from the busiest shifts observed. In the first instance, the head nurse asked the physician if he would like to see some of the patients who were waiting in the ward, since some of them had been waiting for up to four hours. The physician, who had been writing up notes on one of the patients, stood up and said, "There are people in here who have been waiting that long?" At this the head nurse smiled and said, "No, not really. I just wanted to get you to see these people that's all." The nurse's rationale for her action was not that the patients were in urgent need of treatment, but rather that they were taking up space in the ward. Other pressures may be put on the physician without the attempt at humour, and these are more likely to result in some hostility from him. Thus, the head nurse may walk over to him with a pile of charts and just say, "do you mind looking at these now sir?", and then turn around without waiting for an answer. Or the action may not be accompanied by any words, as in cases when the head nurse simply hands the charts to the physicians.

This type of initiation of action by the head nurse is fairly recurrent, so that the duty physician may find that on each occasion that he sits down to write the notes on a patient, he is asked to see another group of patients who have come into the ward. At this point he may attempt to block the head nurse by saying that he will "see them in a moment."

but the latter usually suggests that he leave the writing until later when he has got the patients out of the way. For example, during one evening the duty physician was sitting at the station when the head nurse came up to him and said, "Could you see these people now? If you get them out of the way now you'll be able to write their charts up later." The physician stood up and said that he would rather finish the writing, since that way he would be sure not to forget it. The head nurse, then replied, "We'll remind you sir." At this the physician complied with the request and went over to the board and took out the first chart.

A similar pattern of interaction usually emerges on evening shifts when the X-ray department does not read the plates. At these times the negatives are sent down to the ward to be read by the physician on duty. On these occasions, the head nurse is likely to ask the physician to read them as soon as they come down, even though he may already be doing something. Thus, for example, she will walk over to him and hand him the plates and the chart and ask if he would mind examining them straight away. She may show that she does not like having to make him do this by prefacing her request by a statement which conveys her understanding of how hard he is working, such as, "I know you're very busy sir, but if you could just get these out of the way first".

This argument, that the head nurse in periods when the ward is busy starts to initiate action for the physician, can be supported with data from observed interaction that was recorded on the ward. Thus we find in two periods the rates of interaction between the head nurse and physician change in accordance with the number of patients on the ward.

In the first period, when there were four patients waiting to be seen by the physician, the physicians initiated action ten times for the head nurse, whilst she initiated action for them four times. This refers only to the initial action of either the head nurse or of the physician, and does not include the reaction. Thus, if the interne tells the head nurse that he wants an X-ray taken on a patient, this is counted as one action, but the head nurse's reply is not counted.

In this period then, the physicians directed twice as many instrumental actions at the head nurse. However, in the second period, when the number of patients had grown to ten, who were waiting to be examined, the physicians initiated a total of ten actions for the head nurse, and she initiated only one action less.³ This evidence would suggest that there is a change in the amount of interaction as the ward becomes busier, and that this change results from the head nurse's tendency to initiate comparably more action for the physician during these times.

The second type of strategy involves an attempt on the part of the head nurse to speed up the process of diagnosis. Thus she may tell the physician to decide what he wants to do with a patient, or she may tell him outright that she needs a bed that one of his patients is occupying whilst he makes up his mind. At these times the head nurse is also

³This data was collected over one three hour period, in which both the duty physician and interne were present. In the course of this time, the same duty physician remained on the ward, and also the same head nurse, so that personality differences are held constant. These two periods were selected because evidence was available for both concerning the numbers of patients waiting to be examined.

likely to refuse requests for bed space by the physician who may want to leave a person in the ward for observation purposes.

As an example of the first type of pressure we can cite an occasion when the interne was undecided about what to do with a patient that he had just examined. The head nurse, who was standing next to him at the desk said to him, "Come on chief, make up your mind and tell us what you want done with him". The interne replied that he thought he would like to have the senior in surgery come down to see him. At this the head nurse laughed and said, "Oh chief, if you admit all the people you see down here, there won't be any beds left by the end of the day." The head nurse then paged the resident in surgery and asked him if he wanted to come down to see the man. The resident replied that there seemed to be no basis on which to have the man admitted, so the head nurse then contacted one of the social service workers to come to see the patient. This was done without consulting the interne. In effect, the head nurse by-passed the physician in deciding what should be done with the patient. Whilst he had asked to have the man admitted, she had him referred to the social service agency once the resident stated that he thought that there was no reason for his coming to examine him. A similar incident occurred between the head nurse and one of the duty physicians, who had asked to have a patient left in the ward for observation purposes. When the physician next came up to the nurses station, the head nurse asked him, "have you decided what you want to do with the man in room eight, bed one, yet?" He said that he had not, at which the head nurse replied, "Well could you let us know soon because

we need the bed".

The head nurse may also tell a physician that he may not leave a patient on the ward for observation purposes, since the ward is too busy and beds are needed. Thus on one instance, a patient who had come into the E.R. to be prepared for a booked operation, which he was to have had under general anesthetic, was found to have eaten a hearty breakfast before he had come into the hospital. When this information was conveyed to the physician involved, he told the head nurse that he wanted to have the man kept in the E.R. until the next day when he would be able to re-schedule the operation. When the physician said this, the head nurse replied quite firmly, "You can't keep him down here. What if it gets busy?" She then suggested that he should have the patient admitted to the ward he had originally been going to, and the operation could then be carried out the next day. This was accepted by the physician as a suitable course of action. Similarly, the head nurse may allow a physician to leave a patient in the ward, but does so conditionally. Thus she may say, "you can leave him there for now, but if we need the bed we'll be sure to holler".

Thus, as the ward becomes busier, the pressure on ward facilities, and especially bed space, reaches a point at which the head nurse starts to initiate action for the physician on a fairly regular basis. The physician in turn, finds that he is faced with a situation in which he is required to spend shorter periods of time on each patient. He may find that he is given "two minutes" to make up his mind, and that if he is not

willing to accept this, the demands made may become even greater.

Generally the physician manifests some degree of irritation at the fact that he is being required to work faster, and this may be made apparent by his own statements, or by his tendency to become highly critical of the nursing group during these periods. Thus, when the head nurse came over to the interne and put a pile of charts in his hands and said that she would be very grateful if he could find time to see these at some time, the interne walked off up the hall complaining out loud to no one in particular that he was "very rushed". Alternatively, he may choose to voice his sentiments indirectly, but in such a way as to make them scarcely veiled, as when a woman physician told the head nurse on a busy afternoon that the place was a "rat race" and that she would be glad when she could go off duty. Likewise, the physician may make his resentment felt by criticizing the administration of the ward, but on such occasions he may find that the criticism is turned against himself. For example, one duty G.P. commented every time he came up to the desk that the ward was completely filled with patients. "There are too many people in here. What will happen if they bring an accident in now? There will be no where to put it". The head nurse replied to him that if he could "just see a few of the people that are in here now" then they would be in a better position to cope with any emergency cases.

The physician's resentment stems from two sources. Firstly he is in a situation in which he has action initiated for him by lower status persons, and secondly his interests are threatened, since he is not able to

spend as much time on each patient as he would like. The first of these sources of strain, as we have seen, arises from the fact that the chart board, which in theory should allow the physician to determine his own work pace, is not allowed to regulate the pace of ward activities. Rather, because of the importance of the informal communications system, the board represents the formal, or organizational model of ward procedure, in which the physician is master of his actions on the ward. However, since the chart board is not effective as an impersonal regulator of activities, interaction between the physician and head nurse is not restricted to the transmission of information and orders, as the formal model implies. Instead, requests for action flow in both directions so that the physician is placed in a position in which the pressure is not mediated by any technical device.⁴

In this situation, we have a high status actor having to accept the demands of a lower status person, and there is in consequence some degree of tension which arises from the feelings of status deprivation experienced by the physician. The tension stems from the fact that the head nurse demands action from the physician who has higher status both in the hospital, and wider community. Unlike the quiet periods, when the physician may have action initiated for him in return for a favour performed by the head nurse, when the ward becomes busier, the rate of interaction increases as the head nurse directs a greater number of demands towards the physician. Thus he

⁴See for an examination of such mechanisms in another setting, W. F. Whyte, "The Social Structure of the Restaurant", American Journal of Sociology, Vol.54, 1949.

may experience some degree of status deprivation which cannot be mitigated by withdrawing from the ward, or by demanding that the formal procedure be adhered to.

The second source of strain lies in the conflict between the physician's interests in the situation, and those of the head nurse. The former is interested in maximizing the amount of time he may spend in making a diagnosis, whilst the head nurse is concerned with reducing the amount of time that each patient spends in the E.R., since she has the problem of ensuring that enough beds are available at all times. Thus, the opportunities for deliberation are minimized as the head nurse requests him to reach decisions within shorter time periods. Thus a form of "decisional urgency" is forced upon the physician, in which he has to make clear decisions without having an adequate amount of information on which to make these.⁵ Thus to some extent the relations between the physician and the head nurse may be envisaged as one between line and staff authority holders, in which the administrative needs take precedent over the needs of specialists.⁶ In this situation the physician is less able to acquire the autonomy that he has when the ward is not busy, rather he constantly finds that his interests are being overruled by the head nurse. His hostility, then, is a response to the fact that his rights are restricted by the power

⁵See on this W. E. Moore, Man Time and Society, New York: John Wiley and Sons, Inc., 1963, pp.100-102.

⁶For an analysis of this type of pattern of relationships in a bureaucratic setting, see R.K. Merton, "The Role of the Intellectual in Bureaucracy", in Social Theory and Social Structure, Glencoe Free Press, 1963.

of the head nurse, and that he is unable to demand the conditions in which he is able to determine his own work pace, and thus his certainty with respect to diagnoses.

Under these conditions, the physician attempts to reassert his status by either criticizing the nursing staff, or by demonstrating his superior medical knowledge over them. Thus one physician, who had been subjected to considerable pressure from the head nurse, attempted to demonstrate his superior status by criticizing nurses who had made minor errors in completing the patient's record. In two charts which he examined, he found errors, one of which involved a missing word in the patient's statement of his complaint, and the other involving the incorrect use of a word. On the first occasion, he read the chart, laughed out loud, and then asked the head nurse if she would mind calling the nurse who had taken the record, to the desk. When the nurse arrived, he handed the chart and said, "The patient states that he has a bad what on his leg?". The nurse looked rather sheepish and replied that it should be a laceration. At this the physician said, "Well why didn't you say so then?", and walked off. On the second instance, he asked the head nurse to call for the nurse in question and when she came to the desk he asked her what a "long finger" was. She held up her hand and indicated her middle finger, at which the physician burst out laughing. The nurse then said that they had been told to call it that in nursing school and that anyway, "it is the longest finger". The physician started to laugh again and then told her to "come off it". She then turned away, and went back down the corridor without saying another word. In both

these cases the physician deliberately called a nurse to the desk and mocked her for making a simple error which did not affect his ability to understand the meaning of what was written on the chart.

On other occasions the criticisms may involve more serious matters, as when the duty G.P. told the head nurse to inform the nurses, that they should not shave the heads of patients who were to have stitches put in their heads, since by plastering the hair down with 'sativlon' he could just as easily get at the laceration. The criticism may also be directed at the nurses in terms of their lack of cooperation. Thus, the physician on duty during a busy evening shift asked the head nurse if he could have a student nurse to follow him around and prepare the surgeries for him. The head nurse assigned him one, and he went off to suture a patient in one of the surgeries. A short while later he came back to the desk and was told that there was another suture case waiting for him in the surgery. He went off, but a few moments later he came back to the desk and said to the head nurse, "Where is my nurse? What I want is one nurse who will follow me around and get things prepared for me and know where I should be next. If you could do that for me Miss_____, we'd get through this a lot quicker". The head nurse then turned to one of the student nurses and asked her to stay with the physician, and as an aside she remarked, "what he really wants is someone to hold his hand for him". The student nurse later asked the head nurse what she should do since the duty physician, whom she was helping in one of the surgeries, was saying "really unpleasant things about all of you, (the nurses), and criticizing

you".⁷

But the physician may demonstrate his superiority over the nurses without the risk of alienating them by showing his wider grasp of medical knowledge. Thus one "safe" technique which he may employ is to use the technical language of medicine when discussing a patient with one of the nurses or another physician. This may set up a "communications barrier", as some writers have suggested ~~have suggested~~, but it also has the latent function of asserting and reinforcing the physician's status in the ward. When a nurse inquires what is wrong with a particular patient, she may be told in medical terminology, and this will often prompt her to remark something to the effect that she is "no wiser for that". Similarly, in discussing medical matters at the desk in the nurses station, physicians may well employ technical terminology, which has the function of reminding the nurses that the physician is considerably more sophisticated

⁷It is possible that this conflict between physician and head nurse has an impact upon the patients in the E.R. This is suggested since the number of complaints made by patients against the service given in the ward, appears to increase as the ward becomes busier.

There are two possible factors involved in this, firstly the level of affect, and secondly the length of time spent by each patient on the E.R. The first of these refers to the possibility that as the conflict between the head nurse and physician becomes more visible, so the patient's uncertainty about the quality of the service provided, increases.

A similar argument has been advanced by Caudill to explain the incidence of collective disturbances in a total institution. Following an idea proposed by Deutsch, he suggested that the communication of affective, as opposed to cognitive information is more easily achieved. That is, the transmission of sentiment is more easily effected, than the transmission of factual information.

See W. Caudill, The Psychiatric Hospital as a Small Society. Harvard University Press, Cambridge, Massachusetts, 1958, pp.8-9 and Chapter 5 passim.

in matters concerning medicine than she is.⁸ However, this may sometimes backfire on the physician as when he uses a complex term in place of a commonsense one. For example, on one occasion the head nurse handed the interne a chart and asked him what he had written on it since she could not understand his writing. When he had told her, she laughed and remarked that that had not helped her and that she would like to know what that meant in "English". When he said that the term referred to a bleeding nose, she burst into renewed laughter and proceeded to tell the other nurses of this.

Clearly, the physician is in possession of a greater amount of knowledge pertaining to medicine, and is able to utilize this to support his claims to higher status, during periods when he is under pressure from the head nurse. So, for example, when asking if she can use a substitute

⁸The fact that the physician plays his role in a large organization is important in understanding his opportunities for demonstrating his high status. Thus, such places as staff canteens provide a setting in which he may set himself off from the nurse simply by dining with other physicians.

In the hospital in which this study was carried out, there was a well institutionalized seating arrangement, which provided the physicians with places near the main entrance, whilst other personnel sat at further distances away from the door depending upon their status in the hospital community. Thus at the very bottom of the canteen the cleaners occupied tables to themselves.

Other writers have commented upon the fact that the physician may dress himself in clothes that differentiate him from the other groups working in the hospital. In the E.R., the duty physician generally wore a close fitting cap throughout the course of his stay on the ward. This ostensibly is worn as a part of the sterile precautions employed in the surgeries, however it may be noted that whilst the physician usually wears one of these, the precautions never extend to the nurse, whose hair remains uncovered during the proceedings.

See on the status reinforcing functions of dress in hospitals, J. Roth, "Ritual and Magic in the Control of Contagion", American Journal of Sociology, Vol.22, no.3, 1957.

drug in place of one ordered by the physician which is not available, the physician is likely to carefully enumerate the reasons why the drug he prescribed should be used in preference to others. Or, an interne may mention, in discussions with both nurses and physicians, that he is intending to publish an article on a very rare type of pneumoconiosis that he had the good fortune to come across. This type of occurrence in the E.R. may be seen then as having the function of demonstrating the physician's high status in a situation in which he is to a large extent dependent upon others of lower status.⁹

⁹For the interne, the situation is a little different, in that to a much greater degree than the duty physician he is treated as an equal by the nursing group. The reason for this lies in the fact that the interne tends to be of much the same age as many of the nurses, and in consequence, shares non-medical interests with them. In this context then, he may attempt to demonstrate that he is not only of higher status than the nursing group, but also that he is more capable than would be expected from his age.

In this light much of his behavior may be seen as a form of "Role Distance", by which he conveys that he is superior to many of the tasks he is called upon to perform. Thus during certain "routine" operations, such as lavages and suturing minor lacerations, he may engage in a form of banter with the nurses assisting him. Such joking may be seen as having the function of diminishing the stature of the task to the level at which it may be performed without apparent concentration on his part. Thus for example, after helping the interne during a lavage the supervisor turned to one of the other nurses and said, "it's so funny in here that you can't concentrate on what you're doing half the time". During this operation the interne engaged in a more or less continuous patter with the nurses, many of the medical accessories were transformed into props, so that his plastic apron became a Dior gown, whilst the aspirins the patient had swallowed were evaluated to see if they were "the instant flaking kind".

The interne though, cannot afford to behave in this way in front of most of the patients, since this would undermine his status in their eyes, rather such performances are restricted to occasions when the patient is not able to comprehend what is going on around him.

To summarize our argument so far, we see that the ward situation becomes more prone to conflict as the numbers of patients seeking attention increases. This conflict, we suggested, derived from the head nurse's attempts to force the physician to increase the pace at which he worked, since he constitutes the only element in the situation that could be manipulated to remove much of the pressure on ward facilities. However, by placing greater demands on the physician, the head nurse threatened both his security and his status, and this in turn created some degree of hostility between the two. This conflict is evidenced by the amount of criticism levelled by the physician at the nursing staff, and by his attempts to demonstrate his higher status over them.

The head nurse's view of the physician tends to contain as its central element, an image of him as a deviant, motivated by considerations of self interest. Thus on occasions when the ward is busy, the head nurse may comment frequently on the physician's recalcitrance, and his general unwillingness to cooperate. For example, the head nurse asked the physician to look at some X-ray negatives for her, and after saying that he was being expected to do too many things at once, he took the plates and went into the doctor's room with them. When he had not returned within a few minutes, the head nurse turned to the ward clerk and said, "oh what is he doing now? All he needs to do is to find out whether there are any obvious fractures. There is no reason why he should stay in there all this time". She then paged him through the communication system, and called him to the desk to see some patients. The same head nurse also expressed her views on ward doctors when she said, "some of the doctors down here are no

use at all - when it starts to get busy they complain and say that they don't want to rush things. You just have to push them, if you don't, there won't be any beds left and the patients couldn't be treated. I don't want to do it but if I don't, then nothing would ever get done".

At another time the physician asked the head nurse if he could have a room in which to examine a patient. She told him that there were no rooms but that if he would care to see some of the other people in the ward, then they might be able to make some room. The head nurse then said to one of the other nurses, "some doctors do nothing but complain, if they chose to do some work instead, then things would be very different". On a similarly busy day shift, the head nurse complained about the way the interne was not working as hard as he could. She turned to one of the other nurses and said, "if only he would get on with it, we'd have all the patients out of here in a matter of minutes. No, instead he has to stand around talking to other doctors".

On another instance, when the head nurse was showing the observer around some of the other hospital wards, she was told that there was a notice pertinent to the E.R. pinned outside one of the doctor's rooms. The notice was an informal suggestion proposed by a physician, saying that if the hospital wanted to get physicians to staff the E.R., they should for one thing be paid a flat rate per day. The head nurse on reading this said, "that is all a lot of the doctors want, more money. If they didn't charge the patients then we wouldn't have to put up with so many complaints. Many of the people who come in become very annoyed when they find they have to pay. They never had to pay you know when only internes

covered the E.R." This complaint is often directed at the physician when the ward is busy so that the nurses may say of him that he is only "in it for the money".

Thus, during busy periods the head nurse defines much of what the physician does, as evidence of his lack of motivation. This in turn reinforces her interest in putting pressure on him, since she has not only to demand action from him in order to reduce the strain on the ward facilities, but also to ensure that he is doing more than the minimum amount of work possible. The nurse's perspective then, may be seen as adjustive since it allows her to frequently initiate action for the physician without at the same time experiencing any discomfort.

The question remains of why the physician allows the head nurse to make such demands upon himself. Firstly, the reason why he does not withdraw from the situation in such circumstances can be understood in terms of the formal role requirements of the ward, which specify that he is responsible for the patients in the ward. Thus if he chose to withdraw, under the pressure from the head nurse, he would run the risk of damaging his reputation and hence his career chances, since he would be held legally responsible for the consequences of his actions.¹⁰

¹⁰The physician may attempt to withdraw from the ward though on some occasions, but this action is usually followed by increased pressure from the head nurse. Thus, one head nurse told the observer that on one extremely busy evening shift, the duty G.P. refused to come out of the doctor's room until a few of the people who were around the desk moved away. The head nurse replied that the number of people there would increase unless he did something about it. Accordingly, the physician complied with her request.

Another similar incident occurred when the duty physician went into the doctor's room and remained there for about five minutes, during a

Thus the physician is not in a position that would enable him to retreat, or withdraw from the ward setting, rather there is considerable constraint, exercised by the nursing staff, operating upon him. The costs of withdrawing are far greater than those of remaining in a situation where his status and authority are diminished. But it is also possible to see the reason why he does not try to assert his authority and overrule the head nurse's requests for action.

Since the physician is dependent upon the head nurse for the performance of various informal services which are crucial for him, by attempting to assert his authority over her he increases the possibility of alienating her. If he fails to comply with the demands made upon him, the possibility exists that the head nurse will refuse to carry out these services for him. Thus the physician may find that the head nurse will not carry out some task that would save him time. For example, the head nurse refused to perform an E.G.G. test for one of the physicians who was not working fast enough for her, but was standing in the nurses' station, joking with one of the graduate nurses. When he asked her if she would do it for him, she replied "you know sir that I am not supposed to take E.C.G.s for doctors who can do it themselves, and I know that you can". Or at

10 cont'd. particularly busy evening. After this the head nurse followed him into the room and told him that there were quite a number of patients for him to see and that the longer he chose to remain there, the more there would be. Later, the head nurse said about this incident, "it's really poor when you have to keep asking the doctor to do things. Some of them are completely useless and try to avoid doing anything much, but they only succeed in making matters worse".

Retreatism, then, may be a possible strategy for the ward orderlies and cleaners who risk very little by minimizing their participation in the situation. However, by following this course of action, the physician runs considerably greater risks than lower status personnel, and for this reason it is rarely embarked upon by him.

another time one of the supervisors withdrew her informal support for the interne by warning him that on future occasions he could do his own work. The interne asked the supervisor if she would take the blood pressure and weigh one of the patients, which she did. When she told him the results he said that she must have made an error, and asked her to repeat it for him. The supervisor did not go and do it but stood and joked with another nurse about the interne. After several minutes, the interne turned around and asked her if she had re-taken the tests he had asked for, to which she replied that she had thought that he had been joking. At this the interne said that if she could, she should repeat the tests at once for him. The supervisor then said that she would do it for him "this time", but he could do it for himself in future since there was a rule which said physicians should take their own blood pressure on patients.

In both of these incidents, the refusal of service was framed in terms of the formal rules of the hospital, so that the physician was both reminded that the nurses were going out of their way for him, and warned that he was deviating in some respect. Similarly, the nurses may refuse to perform a role obligation toward the physician in order to demonstrate their power. For example, the head nurse walked up to the desk and said to one of the nurses, "Dr. _____ wants some more warm water". The nurse replied, "Well he can get it from the same place I did, the tap." At this point the physician came up to the desk with a basin in his hand which he put down on the desk with some force. The head nurse picked it up and passed it to the nurse who said rather grudgingly that she would fill it. At this the physician said that he had not realized that the bowl only

contained water, but thought that there was a chemical in it. The head nurse then laughed and said, "Now don't get so agitated over it. You are only swabbing a child's ear anyway". This brought forth a burst of laughter from the other nurse, whilst the physician attempted to say that he had not been thinking about the water, but rather about the causes of the child's illness. In this example there are two points to be noted. Firstly, the nurse in question demonstrated her unwillingness to carry out this task, even though the physician was making a legitimate demand on her. Secondly, the physician's attempt to legitimate his behavior was not accepted by the nurses, even though it was clearly designed to restore the situation to one of harmony. Rather, the physician's excuse was brushed aside without ceremony and he was forced to accept that his demand had been inappropriate.

In these ways then, the head nurse may force upon the physician realization that he must make sacrifices if he is to receive the full cooperation of the nursing staff. However, if the physician attempts to assert his authority, he is likely to find that he is in danger of losing the support of the nursing group, which is essential to the performance of his role. In his relations with the head nurse then, he will be less likely to reject her right to make such demands upon him, since by refusing these he runs the risk of not getting cooperation when it is necessary.

In this chapter we have examined the pattern of social relations between the head nurse and various other ward members during periods when

The E. R. is busy. We have argued that as the pressure on ward facilities grows, the head nurse employs two strategies. Firstly, she attempts to centralize her authority by centrally directing and coordinating the actions of the nursing staff. A consequence of this pattern was that conflicting relationships between the head nurse and the staff occurred, as the nurse's autonomy was reduced. As the relation became marked by this element of conflict, the head nurse initiated further attempts at centralization to increase her control.

Her strategy with reference to the physician derived from the fact that as pressure on ward facilities increased, the head nurse was powerless to influence variables external to the E.R., which affected its ability to function under such conditions. We argued that since the physician was a member of the ward, and was also responsible for deciding what was to happen to each patient, he became the focus of the head nurse's attempts to control the situation. Thus, by putting pressure on the physician, the head nurse attempted to speed up his work pace and thus reduce the amount of time spent by each patient in the E.R. This had the consequence of creating tension in the ward, since it meant that the physician became in some respects subordinate to the head nurse. We suggested that the physician remained in the ward, even though he was losing his authority, because of the fact that his responsibilities committed him to the role for the duration of the shift. Similarly, it was argued that he did not attempt to exert his authority, in order not to lose the support of the nursing group who performed certain informal services that were crucial to him.

CHAPTER 6

SUMMARY AND CONCLUSIONS

CHAPTER 6

Summary and Conclusion.

The purpose of this thesis has been to examine the relationship between uncertainty and the social structure of complex organizations. More specifically, we concentrated on the distribution of power and types of uncertainty as these affect the participants. We have attempted, by means of participant observation, to collect evidence pertaining to this question, by examining the structure of an Emergency Ward, where prediction was impossible concerning the numbers of patients who would make use of the service during any time period. Since the number of people who came into the ward influenced the possibility of performing role obligations in the ward, this variable was particularly important to the participants themselves.

Our primary concern was to specify the strategies employed by the key participants in the ward, the head nurse and the physician, since each of these was responsible for the achievement of goals important to the other. Thus the head nurse was responsible for the allocation of ward resources and the coordination of activities, whilst the physician was concerned with the diagnosis and treatment of patients in the ward.

With reference to the physician, we noted that he was directly concerned with two types of uncertainty, firstly that deriving from the difficulties of diagnosing illnesses, and secondly uncertainty arising from

the pattern of social relationships in the E.R. Medical uncertainty impinged upon the physician as a result of the general condition of medical knowledge, and the physician's incomplete knowledge of medical theory. This meant that in the ward situation, where there was a large turnover of patients, many of whom had never been treated there before, the physician was confronted with the task of correctly diagnosing and treating patients for whom he had little past information in the form of old records. We argued that in this setting he would attempt to maximize the amount of time he could spend on each case, and that this involved using the ward for observation purposes, whilst tests were carried out. By increasing the length of time the patient remained on the ward, the physician made it possible to check the accuracy of his diagnosis, before finally deciding what course of action to follow.

Besides the medical uncertainties confronting the emergency room physician, certain other contingencies were present which derived from the social structure. Thus, we noted that because of the lack of predictability afforded to the ward staff, the appearance of a genuine emergency case in the ward was not determinable. Since also the physician was not aware of the ailments of the various patients who came into the ward, virtually until he came to examine them, their presence had to be brought to his attention by the head nurse. This informal practice serves to ensure that the physician is made aware of any patients that come into the ward and are in need of immediate treatment. Thus, he is highly dependent upon the head nurse for the provision of this service, which is crucial to the performance of his role.

However, since the service is informally based, the physician can not demand it as a right, rather he must treat it as something to be bargained over. Thus, we argued that he attempted to enter into the informal structure of the ward, by dropping all claims to status and deference, and thus demonstrated a desire to be accepted as an equal in the situation. We viewed the physician's informality in the ward as an attempt to create a system of reciprocal relations, in which he offered the removal of status formalities, in return for the continued support of the nursing staff at the informal level.

For the head nurse, the major source of uncertainty lay in the problem of allocating resources so that all the patients who needed treatment could be accommodated in the E.R. Since there was no way of knowing how many patients might come into the ward at any time, the head nurse attempted to obligate the physician by performing a number of "favours". Thus at times when she wanted something done by the physician, she could request him to return the favour. In terms of the actual types of service provided, the head nurse would perform tasks for the physician some of which were "illegal" in the context of the hospital formal rules, and in return for these she would request his assistance in order to move patients through the ward when she needed the space.

Thus, both the actions of the head nurse and physician, are oriented to ensuring that the other will either, continue performing, or can be relied upon to perform some task that is viewed as vital by the other. Insofar as the ward system is based upon cooperation on the part of these two main role groups, this is provided as much by the informal reciprocity,

as by the formal requirements of the division of labour.

The fact that the ward is vulnerable to rapid changes in the numbers of people making use of its facilities is also important with regard to the problem of the relations between the head nurse and the nursing staff. When the ward becomes busier, and there is considerable pressure on bed space and surgeries, the head nurse's attitude toward both the nursing staff and the physician changes.

Firstly, with reference to the ward staff, we noted that the major pattern of coordination employed in the ward is one in which there is considerable decentralization. Most of the staff enjoy autonomy, and are able to dictate what they shall do for themselves, so that intervention by the head nurse is limited to the transmission of information. Control in this situation, is maintained by the head nurse through two complementary techniques. Thus, we noted that the head nurse allowed certain infringements of the formal rules where this would enable her to obligate the nursing staff. At the same time, the head nurse enforced other rules which were not central to ward activities. Infractions of these rules were always corrected by the head nurse, and the offender was made aware of her error. We suggested that this process had a latent function, which was to provide a constant reminder to the staff that even though it was rarely exercised, the head nurse still was the dominant figure in the authority structure. Thus enforcement of this rule served to set a limit on the degree of informality that could emerge, and also provided the head nurse with a means of reminding the members that she would still exercise her authority, if this became necessary.

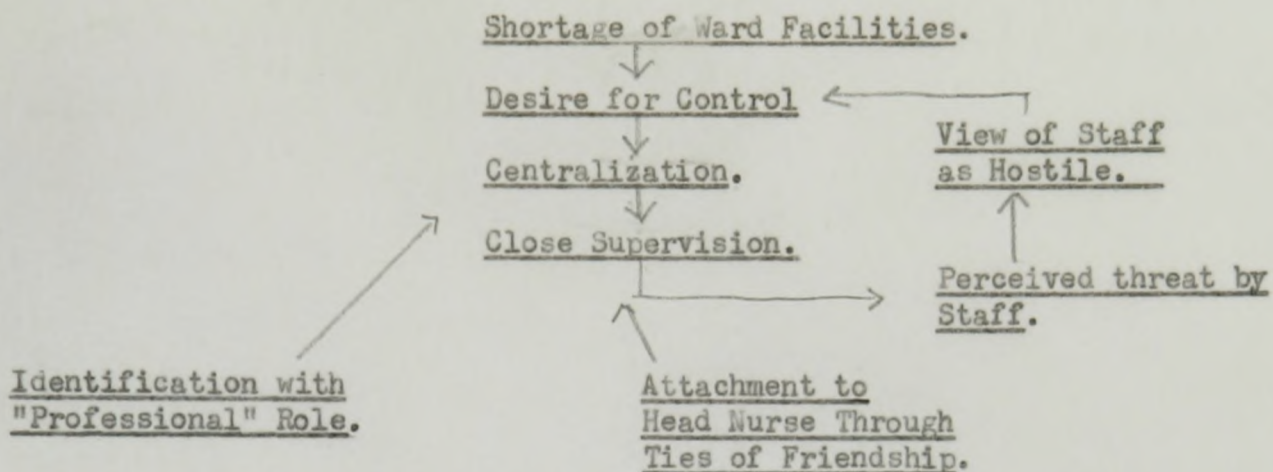
As the E.R. becomes busier, the patterns of coordination and control change somewhat. Thus, as the pressures increase, the need for flexibility in the allocation of facilities becomes greater. To meet this need the head nurse begins to take a greater part in the direction of ward activities, so that there is a tendency toward centralization. As this process continues, the head nurse's directions and her close supervision of the staff function to create resentment among the latter. This resentment derives from the nurses' perception of close supervision methods as threatening to their occupational self images. Thus, as the head nurse starts checking on them, to find out if they have finished their allotted tasks, they define this as a threat to their competence. The hostility that is expressed in this situation reinforces the head nurse's desire for further control, since she sees this as evidence of their recalcitrance.

To ensure that they are not failing to perform their role obligations, she redoubles her efforts at supervision, so that the process is reinforced and forms a "vicious circle" in the sense employed by Crozier.¹

This argument can be represented in model form, as suggested by March and Simon.²

¹See M. Crozier, The Bureaucratic Phenomena, University of Chicago Press, 1963, pp.182-183.

²Organizations, John Wiley and Sons, Inc., 1958. The third chapter of this work contains an analysis of the major contributions of organization theorists, and also an attempt to represent the conclusions of Merton, Selznick and Gouldner in model form.



The model shows that the control spiral is contained by the strong orientation of the nursing group to their occupational role, and also by their primary relations with the head nurse. These two factors prevent the process from reaching the point where conflict between the participants brings activities in the ward to a halt.

We may now turn to the relations between the head nurse and the physician during periods when there were large numbers of patients in the E.R. The first major point was that the social environment of the ward was such as to allow no possibility of control to the E.R. staff, so that as the demand for ward facilities increased, the only possible means of assimilating the patients, was to reduce the length of time they spent on the ward. To do this, the head nurse attempted to initiate action for the physician to speed up the time he took in diagnosing and treating patients. However, we noted that for two reasons this increased the level of tension between the physician and the head nurse. Firstly, tension arose from the fact that a low status actor was initiating action for an actor of much higher status. Secondly, we argued that the head nurse's pressure on the

physician functioned to reduce the amount of time that he could spend upon each patient. This served to reduce his autonomy, and in turn increase uncertainty experienced concerning the complaints of patients.

The physician's hostility, we suggested, was expressed in two ways, through criticism of the nursing staff and through attempts to raise his own status in the ward. The latter of these two was achieved by means of demonstrations of his superior knowledge of matters pertaining to medicine, and by the use of technical language. By using medical terminology he was able to participate in discussions with other physicians, which excluded the nursing group since these for the most part were unable to understand it.³

We noted that the physician might attempt to withdraw from the situation as the pressure became greater, but this we suggested did not constitute a satisfactory adjustment since it resulted in two difficulties. Firstly it led to an increased pressure from the head nurse, and secondly it resulted in some degree of anxiety, since the physician was not treating any patients, and yet he was at the same time responsible for them whilst they were in the ward.

³Whilst we have not been concerned with the relations between physicians in the ward, it may be noted that certain norms held by this group did affect the pattern of ward activities. For example, the physicians shared an understanding that they would offer advice or assistance if it were requested. Thus whilst the duty G.P. might object to having to read x-ray plates when asked by the head nurse, he would do so immediately if it were another physician making the request.

It can be seen that during busy shifts, the physician's obligation to help others in the profession created further difficulties in that he might be asked to examine patients by other G.P.s who had patients in the ward, whilst the head nurse would be attempting to get him to see those that were more properly his concern.

These attempts at withdrawal tended to increase the head nurse's hostility towards the physician, who came to view them as some form of "moral weakness" such as laziness. This reinforced her concern with initiating action for him, because he was viewed as being "unreliable", in the sense that without being asked, he would not do something. Thus the relationship between these two groups became more strained as each came to view the other as failing to perform their obligations.

We suggested that the ward system was prevented from complete breakdown because the participants identified with their occupational roles to the extent that they were willing to remain in the situation even though this was unsatisfactory. Another factor complementing this was that of the physician's responsibilities in the ward. Since he was medically and legally responsible for the patients in the ward, there were constraints focussing on him to prevent him from leaving the situation. Thus, even though the situation was one in which both his status and his autonomy as a specialist were limited, the fact that serious sanctions could be brought to bear upon him for not performing his role obligations, served to deter him from following this course of action.

Theoretical Findings.

In the second chapter of this thesis we examined several theories which we suggested might have relevance to the problem of uncertainty in organizations. The foremost of these was the work of Crozier⁴ which dealt explicitly with this variable. Crozier argued that the existence of areas

⁴M. Crozier, The Bureaucratic Phenomenon, University of Chicago Press, 1964.

of uncertainty in complex organizations provided the basis for the creation of power relations. Power, he suggested, rested on the ability of a group to control an area of uncertainty, and this is perhaps the distinction between the bases of power and magic. Magic is an attempt to render amenable to human manipulation some sphere of life that is highly significant to a group, but nonetheless outside of its control.⁵ Power similarly has its

⁵ The literature on the relationship of magic to uncertainty is quite voluminous, and stems largely from Malinowski's hypothesis that where some realm of uncertainty exists, that vitally affects the activities of the members of a social group, and where there is no possibility of utilizing methods of rational control, then non-rational or magical means would be used in an attempt to render predictable the unpredictable. This hypothesis has been utilized successfully by many writers in the field of sociology, and even in studies of medical institutions. Thus Parsons suggests that one response the physician makes to the uncertainties of diagnosis and treatment, is that of faddishly adopting new drugs as these come on the market, and using them for a wider range of purposes than that for which they were intended. He suggests that the most rational of industrial society's specialists, is as much prone to the allurements of the "wonder drugs", as his medically ignorant clientele.

Roth has also discussed the role of non-rational practices in the attempts of physicians and other hospital staff to overcome problems of contagion in T.B. sanitariums. His main conclusion is that where understanding of "nature's laws" is slight, human attempts at control are likely to be "irrational" and their observance "vacillating and ritualistic".

H. Fox, in an analysis of an experimental ward, where the patients volunteer to serve as experimental subjects in the application of new drugs and techniques of surgery, found that in this area of endeavour there is considerable uncertainty. As a result of this, there arose the practice of betting about the future. This was an attempt made by both physicians and patients to come to terms with a situation in which very little was certain and secure. Betting functioned to allow the physicians to make predictions when there was little chance of their turning out. It provided a way of coming to terms with uncertainty by "formalizing it". At the same time Fox suggests, "that their wagers were petitions for success".

A comparable finding can be inserted here from our own observations. We have indicated that the length of time that results took to come down from the X-ray department was one major concern of the head nurse, it was beyond her control to alter this to any great degree. Yet it is in dealing with the X-ray department that betting was likely to take place. Thus, the head nurse would place a bet with a ward clerk saying, "I bet you that if I

basis in uncertainty, but only in the sense that the uncertainty impinges upon some other group. Thus, workmen can make the foreman's job difficult by working according to rule, and to the extent that they can influence his status in the organization, they have power over him.

It is necessary to return to the hypotheses that we constructed in the second chapter and discuss the extent to which they are supported by the evidence we have presented in the past chapters.

Our first hypothesis concerned the location of power in organizations, and we suggested, following Crozier, that persons who controlled an area of uncertainty, which was important to others, would have power over them. In evaluating this hypothesis we are immediately confronted with a difficulty, since both the physician and the head nurse may be said to control areas of importance. Thus, the physician controls the patient's fate in the hospital, whilst the head nurse controls the flow of information which is crucial to the physician. Thus it would appear that both have potential, if not actual power that they can use. The question arises of why it is the head nurse who has effective control in the ward if this is the case, and we suggest that the reason lies in the fact that the physician is constrained by rules that he cannot for the most part fail to observe. Thus the physician, in theory could stop treating patients and this would make the head

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were to phone them up now, they would say that they haven't started reading them." Perhaps Fox's conclusions are equally applicable to our study on this point.

See B. Malinowski, Magic, Science and Religion, Doubleday Anchor, 1961. T. Parsons, The Social System, Free Press of Glencoe, 1963, chapter 10, esp. pages 467-469. R. Fox, Experiment Perilous, The Free Press of Glencoe, 1959, Chapter 3. J. Roth, op.cit.

nurse's role in the E.R. impossible to fulfil, since patients would not be moving through the ward. However, the costs of following such a line of action would be so great as to make it not worth considering. Firstly, from a professional position, the ward physician would have considerable difficulty legitimating his actions to the members of his professional group. Secondly, his relations with the hospital would be endangered, and finally his reputation in the community would be destroyed. These represent possible consequences which far outweigh the short advantages of attempting withdrawal.

For the head nurse though, her power lends her sanctions that may be applied in two ways. Firstly, she might refuse to convey information about patients, and thus directly threaten the physician's ability to perform his role. Secondly, she can increase the demands she makes on the physician by playing on the fact that there are patients in the ward that he should see. For example, we noted that the head nurse has the informal role of transmitting information to the physician about patients who need immediate treatment, if she chose to, she could make repeated demands on the physician of this nature. She could in effect say that each patient that comes into the ward is in need of immediate treatment, even though this is not necessarily true, and she could legitimate her action in terms of the fact that she is not competent to know when someone is in need of special treatment.

Of these two strategies, the second is the more safe, since it does not involve any risk to the patient, or to the head nurse. At the same time the physician is forced to comply with her requests because he does not

know whether the patients are genuinely ill or not. We would suggest then that the head nurse is able to utilize the power that she has because she can sanction the physician without endangering herself at the same time.

Thus, in examining the first of our hypotheses, we would contend that it has been substantiated but we introduce the proviso that power is negated where its application would endanger the holder's position. Uncertainty, and the possibility of its control, are not then the only factors involved in the generation of power. Before it is possible to speak of power in organizations then, it is necessary to note that it is contingent upon the possibility of it being applied without endangering the user.

Our second hypothesis specifies that where a group possesses power, it will evade formal rules where this is to its advantage. This is not to say that only those groups who have power are able to deviate in organizations, but rather those who do possess power are in a better position to ensure that they are not sanctioned for doing so. This rests upon two possibilities. Firstly that the group is able to prevent those who have responsibility for enforcing the rule from applying sanctions to it, and secondly, that it has power over those who are responsible for informing others about infractions of the rules.

In the case of the head nurse, who allows members of the nursing staff to break certain rules, and who also breaks others herself, we believe that another factor is involved, and that is observability. Thus, where infractions are permitted by her, it is only when it is known that there is very little possibility of her being detected. She allows the nurses to drink coffee at the station on the condition that they do not do so when

an outside supervisor is present. Her willingness to allow deviance rests on the fact that this is to her advantage, in that it indebts the nursing staff to her, but such deviance occurs only when there is little possibility of detection. The nursing staff accept the head nurse's leniency with respect to these rules because it is to their advantage, that is there is consensus on the legitimacy of her actions.

Thus with respect to the second hypothesis we would suggest that a modification should be introduced to allow for the possibility that deviance may take place because there is no means of supervising the rules. We would argue that our second hypothesis does not apply in the case under analysis, but rather rule evasion is made possible by the fact that deviance is not directly visible, and may therefore go unchecked. Given this fact, the head nurse's deviance may be seen as not resulting from her power per se, but rather from the opportunities she has to break hospital rules without being detected.

Our third hypothesis concerns the problem of rationalization and power. We suggested that where a group had power that derived from some source of uncertainty, other groups would attempt to limit its strength by imposing new rules. It would again be wrong to see rationalization as simply an attempt to restrict the power of a group, but rather it may be viewed as an attempt to make more predictable an area which affects the running of the organization. In effect we have no direct evidence on this point from our study, since to our knowledge no group was actively seeking to have the rules changed. Certainly, the physician, who we would assume to be the most interested in promoting change in order to reduce the head nurse's

power, is interested in changing the rules as they apply to his own position, but these desired changes are not intended to restrict the head nurse. Thus, we could only conclude that our third hypothesis does not stand up to the test of our data since there is no evidence of any attempt by any member of the ward to introduce new rules which function to restrict some other group. However, the hypothesis may have a long term validity which we would be unable to measure in this study. That is, the duration of the study was not great enough to uncover any trends in the predicted direction which might develop. A second possible explanation of why this hypothesis is not directly affected may lie in one of the structural features of the ward, namely the rotation of the physicians. Since the physicians on the ward are not there permanently, it is probable that their experience of strain will be irregular. If they were present in the ward for any long period of time during which they had to serve when the ward was busy, it would be expected that attempts to bring about changes in the formal structure would be made by them.

Our fourth hypothesis concerns the level of tension in the ward as it relates to the types of bureaucracy that Gouldner distinguishes. We hypothesized that the smaller the extent to which elements of "mock" and "representative" bureaucracy present in a situation, then the more open will be the conflict between the groups involved.

On this point we are able to marshal some support, in that it may be seen that tension increases within the ward as elements of "mock" bureaucracy disappear. For example, with respect to the evasion of the rules concerning drinking, eating and smoking we find that in conditions when the

ward is busy the participants are not given an opportunity to have a break, and on occasions they are not able to take time off at their regular scheduled mealtimes. Thus when it is busy, this element of "mock" bureaucracy is withheld from the situation and there is an increase of tension. Yet, we would not suggest that this is a causal relationship at work here, rather we would argue that "mock" and "representative" bureaucracies function to contain conflict between groups. Restated, this means that where there is a considerable amount of consensus between groups concerning the legitimacy of certain rules, the parties will be less willing to introduce elements of conflict if this would threaten already existing areas of agreement. Thus as elements of consensus vanish, there is little to constrain the participants from bringing forward their disagreements with each other.

The fifth hypothesis concerns the extent of "punishment-centered" bureaucracy in the situation. We proposed that where groups introduced new rules with the specific intention of restricting the power of some other group, then a form of "punishment-centered" bureaucracy will emerge. This follows directly from our second hypothesis concerning the relationship between power and rationalization. However, as with this other hypothesis, we are unable to produce any direct evidence with which to test it. We can indicate ways in which this might be modified by examining the data we do have. Firstly we note that the conflict between the physician and the head nurse stems from the demands she makes of him. As such the head nurse is simply "enforcing" the rule which states that the physician should see patients as soon as he can after they enter the ward. This constitutes a

form of "punishment-centered" bureaucracy to the extent that the physician defines these demands as illegitimate. Her ability to successfully enforce the rule rests on the fact that she has an important source of power which she can use with respect to the physician.

If this source of power were to be removed, by the introduction of changes in the ward social structure, the head nurse, we suggest, would be unable to enforce her demands, and would in turn be less able to control the distribution of ward facilities. Since this is the core aspect of her role, it is likely that she would be hostile to any such changes and would resist them. Extending the argument further, we would hypothesize that changes which did rationalize her source of power would be regarded as illegitimate, if they hindered the performance of this core aspect of her role.

It is necessary at this point to determine in what ways this study is of use to the analysis of complex organizations. Since our focus has been a narrow one, we can only make limited generalizations from the findings we have made, and these will bear specifically on the question of unpredictability and uncertainty in complex organizations.

Our problem at the inception of the study was the relation between the social structure of a hospital ward, and the uncertainty it faced with respect to the flow of patients. To the extent that unpredictability and uncertainty with respect to the demand for the services offered are present in many types of organizations, we are able to suggest three mechanisms which are likely to operate in these to reduce the strains created.

The primary mechanism of adaptation is that of centralization of control, which involves the concentration of decision making in the hands of one person who is in a position to know the needs of the organization as a whole. In such a situation, where there are rapid changes in the demand for service, the most likely form of administration is that in which participants and other resources are assigned to tasks as they arise. Centralization serves to ensure that no one segment of the organization becomes incapable of solving the problem before it, or that it does not do so at the expense of other more urgent problems. This corresponds to a form of control in which there is considerable fluidity in the use of facilities, and in which there is opposition to the commitment of any such facilities to any role that would prevent their rapid mobilization.

The second mechanism which we would expect to come into play to handle the problems of rapid changes in client flow, where these are unpredictable is that of role de-differentiation. This means in effect that as the demands placed on the system become greater, so the lines of distinction between the social roles involved become blurred. Thus, formal role designations will be disregarded as the need for personnel to perform various tasks arise. Whereas in organizations in which there is a high degree of predictability, participants are allocated roles on the basis of training, which are not open to those who have not been given such instruction, the situation in organizations facing the type of uncertainty we are concerned with is somewhat different. In this latter type of organization, the boundaries between roles will not be completely impermeable to those who have not received the relevant training. Rather, their assignment will very

largely rest on their availability at a given time, so that a person may find himself performing duties which he is formally barred from doing.⁶

The third mechanism, lies in the form of supervision which we would expect to be employed in such situations. As we noted in the E.R., one of the courses of action that the head nurse follows is that of attempting to speed up the rate at which work is performed. However, to do this we saw that it was necessary for her to make concessions to those under her supervision, and that these concessions took the form of not enforcing certain of the rules in the ward. Thus by not demanding conformity to certain rules, the supervisor places himself in a position in which he can request an extra effort from those under him. We would expect that a form of "mock bureaucracy" is present in which rule evasion is permitted in return for an increase in the work pace, as this becomes necessary.⁷

⁶ On this point there is some supporting evidence. Both Davis and Stone and Crozier note that as the pressure from clients increases in bureaucratic agencies, the distinctions between roles become less clearly drawn. Thus, the incumbents of different positions are required to perform much the same task as the strain on the organization's facilities increases. See M. Crozier, op.cit., pp.19-20. Also R.G. Francis and R.C. Stone, Service and Procedure in Bureaucracy, Minneapolis, University of Minnesota Press, 1956, p.15.

⁷ Gouldner shows that one function of "mock" bureaucracy is what he terms the "leeway" function. This refers to the fact that rules constitute "stakes" with which supervisors can bargain. By not requiring compliance with certain of the rules, the supervisor is able to command support in some area of greater importance to him. As Gouldner points out, "the rules were the chips to which the company staked the supervisors, and which they could use to play the game. They carved out rights which, should supervisors want to, they could stand on". If the subordinate group failed to perform as expected, then the supervisor could strictly enforce the rules he had allowed to lapse, as a punishment.

Blau makes a similar point in noting that a new supervisor, in the

In attempting to evaluate the weaknesses of this study, the writer believes that the most important improvements could be made in the methodology. Participant observation does not allow the student to acquire information that constitutes proof of the validity of the hypotheses to be tested, rather it lends itself to the collection of impressionistic data. This is acceptable as far as the study goes, since it is meant more as an explanatory survey, than as an attempt to furnish conclusive evidence concerning the relationship between social structure and uncertainty. Within the framework of the study, the conclusions we have reached are by no means proved conclusively, instead it is felt that before anything more than tentative hypotheses can be developed, other methods of obtaining data could be employed. For example, the utilization of a questionnaire would have made it possible to state the nature of the relationship a little more precisely. However, we feel that the informal interviews we conducted in the course of the analysis more than compensated for the lack of a formal questionnaire, given the exploratory nature of the study.

Another difficulty results from the fact that a single observer cannot remain in the situation for the complete length of time that the study takes. The observer spent eight hours per day in the ward for a three month period, but in the sense that the remaining sixteen hours of

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See A. Gouldner, Patterns of Industrial Bureaucracy, The Free Press of Glencoe, 1964, pp.172-174. Also P. Blau, The Dynamics of Bureaucracy, Chicago: University of Chicago Press, 1955, pp.213-215.

each day were unobserved, the study is unrepresentative. Attempts to overcome this difficulty were made by observing the various shifts for roughly equal periods of time, but this only succeeded in making the information more representative, it did not make it any more complete.

However, it is still felt that as a method, participant observation was the most fruitful means of conducting the study. To the extent that the ward was small, and that it was possible to recognize all the participants and be in a position to observe them perform their roles, we feel that participant observation was the most suitable method to employ. As Becker⁸ argues the participant observer is able to check on the inferences he is drawing from the study without having to conduct a second survey. As new features of the situation are noticed their significance may be readily evaluated since the source of the observer's information is always at hand.

Insofar as the study was not designed to provide conclusive proof concerning the relationship between uncertainty and social structure, we believe that it has been fruitful in developing hypotheses that may be further tested in other contexts.

⁸ H. Becker, "Problems of Inference and Proof in Participant Observation", *American Sociological Review*, Vol.23, pp.652-660.

BIBLIOGRAPHY

- Bachmeyer, A.C. and G. Hartman. The Hospital in Modern Society. New York: The Commonwealth Fund, 1943.
- Bales, B. F. Interaction Process Analysis. Cambridge, Mass.: Addison-Wesley Press, 1950; pp. 15-16.
- Becker, H. "Inference and Proof in Participant Observation", American Sociological Review, 23 (1958).
- Ben, David J. "The Professional Role of the Physician in Bureaucratized Medicine: A Study in Role Conflict", Human Relations, 11 (3, 1958).
- Bendix, R. Max Weber: An Intellectual Portrait. Garden City, N.Y.: Doubleday and Co. Inc., 1962.
- Bensman, J. and I. Gerver. "Crime and Punishment in the Factory: A Functional Analysis", in Mass Society in Crisis, Rosenberg, Gerver and Howton, (eds.), New York: The MacMillan Company, 1964.
- Blau, P. "Social Integration, Social Rank and Processes of Interaction", Human Organization, 18 (1959-60).
- . Bureaucracy in Modern Society. New York: Random House, 1962, pp. 30-32.
- . The Dynamics of Bureaucracy. Chicago: University of Chicago Press, 1955.
- Blau, P. and R. Scott. Formal Organizations. San Francisco: Chandler Publishing Company, 1962, pp. 140-164.
- Bloom, S. W. The Doctor and His Patient. New York: Russell Sage Foundation, 1963.
- Burling, E. M. Lentz and R. W. Wilson. The Give and Take in Hospitals. New York: G. P. Putmans & Sons, 1956.
- Caudill, W. The Psychiatric Hospital as a Small Society. Cambridge: The Harvard University Press, 1958.

- Constas, H. "Max Weber's Two Conceptions of Bureaucracy", American Journal of Sociology, 63 (1958).
- Coser, R. L. "Alienation and Social Structure: Case Analysis of a Hospital", in Freidson, The Hospital in Modern Society. New York: Glencoe Free Press, 1963.
- . "Authority and Decision Making in a Hospital: A Comparative Analysis", American Sociological Review, 23 (1958); 56-63.
- Croog, S. H. "Interpersonal Relations in a Medical Setting", in H. Freeman, S. Levine and L. Reeder, Handbook of Medical Sociology. Englewood Cliffs, N. J.: Prentice Hall Inc., 1963.
- Crook, R. K. "Role Differentiation and Functional Integration: A Structural Model of a Mental Hospital", unpublished Ph.D. Thesis, Princeton, 1963.
- Crozier, M. The Bureaucratic Phenomenon. Chicago: The University of Chicago Press, 1964.
- Dahrendorf, R. Class and Class Conflict in Industrial Society. Stanford: Stanford University Press, 1959.
- Daniels, M. "Affect and its Control in the Medical Interns", American Journal of Sociology, 66 (1960), p. 259.
- Davis, F. "Uncertainty in Medical Prognosis, Clinical and Functional", American Journal of Sociology, 66 (1960).
- Etzioni, A. Complex Organizations. New York: The Free Press of Glencoe, Inc., 1961, esp. Chapter 1.
- Fox, R. C. Experiment Perilous. Glencoe, Illinois: The Free Press, 1959.
- . "Training for Uncertainty", R. K. Merton (ed.), The Student Physician, Cambridge: Harvard University Press, 1957.
- Francis, R. G. and R. C. Stone. Service and Procedure in Bureaucracy. Minneapolis: University of Minnesota Press, 1956.
- Freeman, H. E. and L. G. Reeder. "Medical Sociology: A Review of the Literature", American Sociological Review, 22 (1957).
- Freidson, E. The Hospital in Modern Society. New York: Glencoe Free Press, 1963.
- Garfinkel, H. "The Routine Grounds of Everyday Activities", Social Problems, 2 (1964), 225-250. See especially pp. 247-248 on the et cetera clause.

- Georgopolous, B. S. and F. C. Mann. The Community General Hospital. New York: McMillan Company, 1962.
- Gerth, H. and C. W. Mills, (eds.). From Max Weber: Essays in Sociology. London: Routledge and Kegan Paul, 1961.
- Goffman, E. The Presentation of Self in Everyday Life. Garden City, New York: Doubleday Anchor Books, 1959, pp. 170-175.
- . "Essay on Role Distance" in Encounters, Indianapolis: Bobbs-Merrill Inc., 1963.
- Coss, M. E. W. "Patterns of Bureaucracy among Hospital Staff Physicians", in E. Freidson, (ed.), The Hospital in Modern Society, New York: Glencoe Free Press, 1963.
- Couldner, A. "On Weber's Analysis of Bureaucratic Rules" in Reader in Bureaucracy, Glencoe, Illinois: Free Press, 1952.
- . Patterns of Industrial Bureaucracy, New York: The Free Press of Glencoe, pp. 176-180. Also Chapter 9, pp. 162-176.
- Couldner, A. W. "The Norm of Reciprocity, a Preliminary Statement", American Sociological Review, 25 (1960), 176-177.
- Hughes, E. C. Men and Their Work. Glencoe, Illinois: Free Press, 1958.
- Jaco, E. G. Patients, Physicians and Illness. Glencoe, Illinois: Free Press, 1958.
- Lee, S., J. A. Solon and C. G. Sheps. How New Patterns of Medical Care Affect the Emergency Unit. Modern Hospitals. 94 (5, 1960).
- Lewin, K. and R. Lippitt. "An Experimental Approach to the Study of Autocracy and Democracy: A Preliminary Note", in P. Hare, E. F. Borgatta and F. Bales (eds.), Small Groups, New York: A Knopf, 1955, pp. 516-523.
- Lipset, S. M., M. Trow, and J. Coleman. Union Democracy. New York: Anchor Books, Doubleday Co. Inc., 1962, pp. 170-172.
- Malinowski, B. Magic Science and Religion. Garden City, New York: Anchor Books, Doubleday Co. Inc.
- March, J. G. and H. Simon . Organizations. New York: John Wiley & Sons, Inc., 1958.
- Mauss, M. The Gift. Glencoe, Illinois: The Free Press, 1954.

- Mayo, E. The Social Problems of an Industrial Society. Division of Research, Graduate School of Business Administration, Harvard University, 1945.
- Mechanic, D. "The Sources of Power of Lower Participants in Complex Organizations", in W. Cooper, H. Leavitt, M. W. Shelly, (eds.), New Perspectives in Organization Research, New York: John Wiley, 1964.
- Merton, R. K. Bureaucratic Structure and Personality in Social Theory and Social Structure, Glencoe, Illinois: Free Press, 1964.
- . Reader in Bureaucracy. Glencoe, Illinois: Free Press, 1952.
- Merton, R. K., G. Reade, P. Kendall. The Student Physician. Cambridge: Harvard University Press, 1957.
- Moore, W. E. Man, Time and Society. New York: John Wiley and Sons, Inc., 1963, pp. 100-102.
- Parsons, T. The Social System. Glencoe, Illinois: Free Press, 1963, Chapter 10, pp. 428-79.
- Presthus, R. The Organizational Society. New York: Vintage Books, 1965, p. 236.
- Reader, G. C. and M. E. W. Coss. "The Sociology of Medicine" in R. K. Merton, L. Broom and L. Cottrell, (eds.), Sociology Today, New York: Basic Books, 1960.
- Roethlisberger, F. J. and W. J. Dickson. Management and the Worker. Cambridge: Harvard University Press, 1939.
- Rosengren, W. R. and Spencer DeVault. "The Sociology of Time and Space in an Obstetrical Hospital" in Freidson, (ed.), The Hospital in Modern Society, New York: Glencoe Free Press, 1963.
- Roth, J. "Ritual and Magic in the Control of Contagion", American Journal of Sociology, 22 (1957), pp. 310-314.
- . Timetables. Indianapolis: Bobbs-Merrill Co. Inc., 1965.
- Roy, D. "Work Satisfaction and Social Rewards in Quota Achievement", American Sociological Review, 18 (1953)
- Seeman, M. and J. W. Evans. "Stratification and Hospital Care: The Performance of the Medical Intern", American Sociological Review, 26 9 (1961).

- Seeman, M. and J. W. Evans. "Apprenticeship and Attitude Change", American Journal of Sociology, 67 (4, 1962), 365-378.
- Selznick, P. T.V.A. and the Grass Roots. Berkeley and Los Angeles, Cal.: University of California Press, 1953.
- Smith, H. L. "The Sociological Study of Hospitals", unpublished Ph.D. thesis, University of Chicago, 1949.
- Social Problems. Entire issue on Medical Sociology, 4(1956)
- Strauss, A. et al. "The Hospital and its Negotiated Order" in Freidson, The Hospital in Modern Society. New York: Glencoe Free Press, 1963.
- Schutz, A. "Essay on Concept and Theory Formation in the Social Sciences" in M. Natanson (ed.), The Philosophy of the Social Sciences, New York: Random House, 1963.
- Tyne, G. S. in Medical Progress, Jan. (1965), pp. 127-128.
- Udy, S. H. Jr. "Bureaucracy and Rationality in Weber's Organizational Theory", American Sociological Review, 24 (1959), 791-795.
- Weber, M. Theory of Social and Economic Organizations. London: Free Press of Glencoe, Collier MacMillan Ltd., 1964.
- Weinerman & Edwards. Hospitals Vol. 38, 1964.
- Wessen, A. F. "The Social Structure of a Modern Hospital: An Essay in Institutional Theory" unpublished Ph.D. Thesis, Yale, 1951, pp. 217.
- White, W. F. "The Social Structure of the Restaurant", American Journal of Sociology, 54 (1949).
- Whyte, W. F. Money and Motivation. New York: Harper, 1955.
- Wilson, R. N. "Teamwork in the Operating Room", Human Organization, 12 (1954).