Stress in Qualified Nursing Staff

and its effect on

student nurses

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Abstract

The aim of this study was to investigate the relationship between the perceived stress in qualified nursing staff and the satisfaction of students with the clinical learning environment. The study consisted of three distinct phases. The initial phase was based on informal interviews with students (N=54) and qualified staff (N=23). Data collected from these interviews was used to develop and design three tools. The latter formed the basis of the second phase of the study - a quantitative survey. Respondents in this phase were pre-registration students (N=162) from one school of nursing, and qualified staff (N=105) from two district hospitals in the south of England. The final phase of the study was carried out using a grounded theory approach. Findings from phase two provided the focus areas for this phase of the study. A total of 13 qualified staff and 18 students were interviewed. Collection of data for the three phases spanned a two and a half year period.

The overall findings, based on the results from all three phases of the study, suggest that satisfaction for students and stress in qualified staff is derived from the atmosphere in, and the organisation of, the working environment. These two aspects were unified by the style of leadership employed in the clinical learning areas. A participative leadership style, which employed an individualised approach to patient care, increased the satisfaction of students and qualified staff, and was associated with reduced staff turnover, sickness and absenteeism. Good social support and social integration strategies existed for nursing staff working in this area. Conversely there was much dissatisfaction of qualified staff and students in areas where authoritarian leadership styles were employed. There was an increase in staff turnover, sickness and absentee rates. Consequently a large percentage of bank/agency staff were employed.

Recommendations include the need for training in participative leadership styles for all clinical managers, and the assurance of individualised patient care in clinical areas where students are allocated. Alongside this there is a need to monitor student satisfaction and qualified staff stress and job satisfaction on a regular basis.
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CHAPTER 1

Antecedent to the Study

1.1 Introduction

Having spent several years as a Ward Sister and then as a Night Sister I found it had become increasingly difficult to devote sufficient time to teaching student nurses. The organization and management of the clinical area took up most of my working day. This resulted in the teaching which I enjoyed becoming a secondary role. I therefore chose to become a Clinical Teacher and later a Nurse Tutor. Caring for people was still implicit in these roles, but the emphasis had shifted from directly caring for patients to caring for students.

The School of Nursing where I worked was attached to a District Hospital. The School provided basic training courses leading to Registration and Enrolment (both general and psychiatric), Midwifery, and various post-basic nursing courses (e.g. care of the spinally injured patient, care of the patient with burns etc.). The District Hospital, which provided the clinical learning experiences for the students, catered for a population of approximately 165,000 people across three counties. The main part of the hospital was situated in a market town, whilst three other sites for inpatient care were spread over a three-mile radius. These four areas provided nearly one thousand inpatient beds. Two small community-based hospitals approximately 15 miles south and 20 miles west of the
main hospital complex were also available for inpatient care. These two areas provided nursing students with a valuable insight into care of patients in the community.

In order to be able to register as general nurses, students are required to undertake a three year training course, which consists of theoretical instruction and clinical experience. The latter accounts for a minimum of 2,300 hours during which time the student is allocated to various clinical environments. These enable the student to participate in, develop and consolidate practical caring skills.

One of the problems I encountered as a teacher was that some of these clinical allocations were viewed by students as positive experiences, whilst others were viewed more negatively. As part of a course leading to a degree in education, I undertook a small scale study to identify the underlying reasons for this occurrence. During this study of clinical learning environments it appeared there were a number of differences which could have affected the students' learning experiences. In some areas qualified staff appeared keen to teach students and ensure that the learning objectives of the module were achieved. In other clinical learning areas staff indicated that low staff levels together with the amount of work they were required to do left them no time to teach students. As one staff nurse said "low staffing levels do not permit such luxuries".
As a result of these initial findings it was decided to initiate auditing of the clinical learning areas in the District Hospital. At this time in the mid 1980s, very few Schools of Nursing appeared to be carrying out any form of an audit of the clinical environment. Eventually three clinical learning audit tools were received from different sources. These were reviewed by myself and colleagues on the Curriculum Development Group, who decided that as these tools were either too lengthy or too complicated, we would design our own which would be appropriate to meet local needs and English National Board (E.N.B.) guidelines.

The audit tool was designed during the second part of my degree study. It was based upon the eight aspects which Ramsden (1980) found were used by students to describe learning in academic areas, and adapted for use in the clinical learning environment. This resulted in an audit tool which helped to identify the experience of staff, the system of nursing care employed, learning opportunities available for students, the teaching skills of the clinical staff, and the links between the service and the School of Nursing. As qualified staff in the clinical environment acted as teachers, mentors and assessors for the students, particular attention was given to ensure these trained staff had been adequately prepared for these additional roles. Only clinical areas which achieved ninety percent of all the objectives were accepted as student learning areas. After a pilot study and some minor alterations, it was adopted and remained in use for five years until 1992. Due to amalgamation of several Schools of Nursing it was
decided to review the audit tool, since when a slightly modified version has been employed. It is interesting to note that the E.N.B. clinical environment questionnaire for the annual report (Holroyd and Crow 1993) is very similar to the original audit tool which we ourselves had developed

Despite this six monthly auditing process, feedback from students continued to indicate that their educational experiences in the different clinical areas varied considerably. In some, students felt valued and treated as "part of the team", whilst in others students expressed feelings of frustration and loneliness and just wanted to complete the allocation as soon as possible. Audits of these areas revealed no apparent reasons why this was occurring. Therefore, discussions with staff from various areas took place. During these it became apparent to me that some members of staff perceived themselves to be "under a lot of stress" from their changing role and the increased workload whilst others, apparently in similar situations, appeared less so.

This raised the question as to whether there was any relationship between the satisfaction students perceived with the clinical learning environment and the perceived stress of qualified nursing staff. Although it was anticipated that stress of qualified staff would vary according to the source of the stress, it was not known what variables in the relationship actually affected students. It was expected that these could vary from stress per se to the nature of the interpersonal communication between the 'stressed' qualified nurse and the student. Intertwined in this relationship was the
issue of whether the stress of trained staff affected their emotions and, if so, did their negative emotions affect the students.

In order to address these issues in more detail I decided to investigate whether any relationship existed between the perceived stress in qualified nursing staff and the satisfaction, which students experienced in the same clinical learning environment. This forms the basis of the thesis presented here.

Since commencing this study six years ago, a variety of changes have taken place which have affected the organisational structure of hospitals and schools of nursing. The introduction of courses leading to a combined award of a diploma in higher education and registration as a nurse, resulted in many schools of nursing combining together to form colleges of nursing within a higher education setting. Although students are still required to complete 2,300 hours of clinical experience during their three-year training, they now have supernumerary status for most of their course. These changes in the educational organisational structure also affected the tutorial staff, many of whom were re-employed by higher education organisations. This personally affected me by adding an extra two hours of work-related travelling time each day.

At the same time this was taking place major changes in the structure of the National Health Service were also occurring and many hospitals were granted trust status. This study therefore took place during a relatively turbulent period for students, teaching staff and health service colleagues.
1.2 Outline of the Study
The initial part of the study was originally designed to use a survey approach with questionnaires based on previously published studies. After reviewing some of these published tests it became apparent that none of them was entirely suitable for the aims of the study. Therefore, an inductive approach was adopted based on a triangulation of methods.

The first phase of the study, during which stressors for qualified staff and satisfaction aspects for students were identified, was based on a qualitative approach. Information gained during this phase formed the basis of questionnaires for the second part of the study. This involved a survey approach across a wider sample of qualified staff and students. The final phase consisted of a grounded theory approach to obtain an 'insider' view of two clinical units, and elaborate upon the information gained during the previous phases.

The study is therefore presented in three distinct phases. The final chapters examine the overall findings from these phases of the study, and include recommendations and reflections on the study. However in order to provide a backcloth for the findings of this study the next chapter examines the macro and micro level changes which have taken, and still are taking, place in the National Health Service, and how these issues may affect the stress of staff.
Chapter 2

WORK, STRESS, and LEARNING

2.1 Introduction

“There is nothing more difficult to execute, nor more dubious of success, nor more dangerous to administer, than to introduce a new order of things; for he who introduces it has all those who profit from the old order as his enemies, and he has only lukewarm allies in all those who might profit from the new”

(Machiavelli 1984)

Although the introduction of change from a managerial viewpoint appears to be fraught with problems, it is the impact of change upon employees which potentially creates the most problems. Change not only disturbs or breaks down established informal relationships between employees, but it also affects their customary ways of doing things, and may be associated with job redundancies. Thus change for workers may be considered a threat which results in arousal of personal anxieties and ultimately leads to a situation whereby the individual resists any form of change. Stewart (1986) argues that employees also associate change with increased work pressure. The attitude of these individuals changes, become more negative and there is a drop in morale. This chapter identifies some of the recent and current changes which are affecting the clinical environment, and the effect these are having on the nursing staff.
2.2 Organizational and sociopolitical changes affecting the clinical environment

Over the past decade there has been a rapid escalation of change within the National Health Service (NHS). The introduction of fund-holding for general practitioners (GPs) and trust status for hospital and community services has resulted in purchaser-provider agreements, and contracting schemes. The introduction of fund-holding GPs means that these individuals may now purchase treatment for their patients from whichever hospital provides the best and most cost-effective service. Therefore the newly formed ‘trust hospitals’ have to provide a service tailored to the needs of these clients and maintain the whole service within realistic costing. Publication of the Patient's Charter (Department of Health 1991) and the regular publication of national performance tables has encouraged trust hospitals to re-examine all areas of the organization in an attempt to provide a cost-effective, efficient health service.

Trust hospitals have used various strategies to attract customers, not least of which are waiting list initiatives, whereby concentrated attempts have been made to reduce the overall waiting time for patients who require surgical intervention. This has been achieved by employing staff on short-term contracts, opening operating theatres at weekends, and the development of day surgery units. However the resultant rapid turnover of patients, together with the increased responsibility, intensity of work, and the actual physical handling of patients has created excessive workloads for the nursing staff, both in the hospital and the community setting. Studies by Gray-Toft and Anderson (1981), Dewe (1987) and Foxall et al (1990), have
all reported excessive workloads as a major source of stress for nursing staff.

In order to achieve a cost-effective organization, staffing budgets within Hospitals have been cut or, at least, not kept in line with the increased patient throughput. Unless contracts are renewed by the purchasers, ward closures may occur. Thus a national tendency within NHS establishments is to employ people either as temporary 'bank' staff, or on short term contracts (Buchan and Thomas 1993). By using this approach financial embarrassment is reduced should the hospital not be able to sell all of its services. Short term contracts for nursing staff frequently range from one month to three months, whilst those for managerial staff typically last for two or three years. Another element of this ‘flexible firm’ approach (Buchan and Thomas 1993) is that of annualised hours, whereby the employee is contracted to work a fixed number of hours per year. Within this system the employee may work full-time for several months, or may be employed part-time over the whole year until such time as they have fulfilled their contracted hours. However, the uncertainty associated with temporary, short-term or annualised hour contracts creates much tension and anxiety for employees. In particular these anxieties are related to their continuity of employment, and the potential loss of earnings. Unlike permanent staff the opportunity to undertake academic courses is rarely available to them. Although they may be prepared to self-fund a course, prerequisites for some courses require them to undertake a set minimum number of hours in the clinical environment. This may result in some staff, employed on a temporary/bank basis, to be unable to fulfill the basic requirements of the course and thus
powerless to obtain the qualifications they need in order to get full-time work. Buchan (1995) therefore considers that ‘casualisation’ of the workforce fails to establish feelings of commitment or loyalty to a clinical area. Thus permanent qualified staff, already experiencing overwork due to understaffing, are often relying on staff who may be poorly motivated.

In their survey of fifty-five national health units in Scotland, Buchan and Thomas (1995) found that 40 per cent of respondents considered the employment of bank staff created a major disruption in the continuity of care for patients. The part-time nature of the work undertaken by these individuals means that patients rarely meet the same nurse on consecutive days. This requires the permanent qualified staff to closely supervise the work of these people. Bank staff often do not work a full shift, but start later and finish earlier than full-time staff. Therefore, by the time the bank nurse arrives on duty much of the work has already been completed - for example, breakfasts have been given out, patients have been prepared for operation, and the early drug round has been completed. The nurse in charge has to break off from work to give a report to the bank staff before they are able to commence work on the ward. This, together with the extra supervision required for the bank staff, creates yet more work for an already overworked permanent qualified nurse.

During the past decade clinical re-grading for nurses has also occurred. This involved the grading of posts within each
clinical environment, which therefore provided nurses with a structured professional pathway. Although it was the post which was graded and not the individual nurse, much anxiety was created during this exercise as many staff found their job was graded lower than they had anticipated. Many took this very personally as they considered they had been effectively 'demoted'. Following this regrading exercise a local review of the 'skills mix' within each clinical area was also undertaken, which resulted in a further reduction of the number of full-time posts available for qualified nurses. The combination of short-term contracts, and the review of the skills mix means that some clinical areas are now staffed mainly by part-time staff.

Meanwhile, reorganization within the trust hospitals has been aimed at improved management of staff. Based on recommendations published in The White Paper - Working for Patients (Department of Health 1989) a "re-appraisal of traditional patterns and practices" (Section 2.13) has resulted in changes to the role of ward leader (formerly ward sister or charge nurse). Managerial responsibilities including budgeting, forward planning and twenty-four-hour responsibility for the clinical area are now included within the ward leader's job description. This changed role has necessitated greater delegation of work to trained staff on lower grades. Traditionally, care of patients was carried out by a method of task allocation, whereby the ward sister delegated tasks to those most able to carry them out. However changes in the ward sister's role, together with standards demanded by the Patient’s Charter (Department of Health 1991) have necessitated the introduction of alternative methods of patient care. Two alternative patterns
of care are usually employed - primary nursing care or team nursing. Both use an individualised approach to patient care.

The primary nursing care approach moves away from the routinised and task-focused method, to a situation whereby a named, qualified nurse has total responsibility for the care of a group of patients throughout their stay in a clinical area. The nurse is thus able to get to know and work with patients as people, rather than just 'doing to' a patient. When the named nurse is off-duty responsibility for care of the patients is delegated to an associate nurse. To ensure as much continuity of care as possible only permanent qualified staff act as primary nurses. However, the reduced level of permanent staff in the clinical area means that most staff nurses are the named nurse to at least seven patients, as well as an associate nurse to at least seven other patients. According to Cavanagh (1992) the increased responsibility, autonomy and accountability encompassed by the primary nursing care approach enhances the job satisfaction of nurses. However McCormack (1992) found that staff perceived an increase in their stress due to the level of accountability required of them in this pattern of patient care, which Malkin (1993) found was often sufficient to cause staff to leave the profession. However the endorsement by the Government of the named nurse concept as a key standard in the Patient's Charter (Department of Health 1991) appears to have boosted the need to adopt this approach to patient care.

The team nursing approach, which is often adopted as an alternative method of providing individualised patient care, consists of the total number of nursing staff in a clinical area.
split into two or three teams, with each team caring for a designated number of patients. Although the team leader may delegate care of patients to each of their team members, there is a tendency to delegate tasks rather than individualised care. Either way the ultimate responsibility for the care of the patients rests with the team leader who is regarded as the named nurse. This approach to care means that each patient is in contact with various members of the team, and therefore the intensity of staff-patient emotional relationships is potentially reduced. Based on her findings from a qualitative study into the effects of primary and team nursing on the administration of night sedation, Duxbury (1994) suggests there is a lack of emphasis on the individual needs of patients in areas where team nursing is practised.

Well-publicized cases of the long hours worked by junior doctors had led to the conclusion that these may jeopardize the quality of patient care. Thus, the working week for junior doctors has been reduced. Yet, at the same time, many hospitals are re-introducing the twelve-hour shift pattern for nurses, despite the fact that findings by Todd et al (1991) suggest tiredness and fall off in performance towards the end of such shifts are inclined to compromise the quality of patient care, particularly for the most dependent patients. Todd et al (1991) also report a significant reduction in the overall supervision of students when the twelve-hour scheduling pattern is employed. Although this off duty system is considered to make better use of nursing resources, and in some areas nurses have requested to work this pattern of off-duty, personal observation suggests that many nurses continue to regard it as yet another cost-cutting exercise.
The reduction in the hours worked by junior hospital doctors has also resulted in an expansion of the role of senior nurses. Many tasks traditionally regarded as the province of skilled medical staff, for example the giving of intravenous injections, are now undertaken by qualified nursing staff. Although most of these nurses welcome the opportunity of greater professional development and autonomy, the expansion of their role has resulted in yet further increase of workloads for more junior nursing staff.

During the last three years, over which many of these changes have taken place, the average sickness rate for qualified nursing staff at the local district hospital (referred to in chapter one) has increased to an average of 16 days per person (September 1995 figure). In an attempt to reduce this, an incentive holiday voucher scheme has recently been introduced within the local hospital. Managers consider this scheme will reduce the total number of days off sick taken by staff, and thus they will not have to employ so many bank staff, thereby reducing the overall cost to the service. The effect of this scheme is not yet known as it has to date not been evaluated.

2.3 Educational changes
At the commencement of this study the local School of Nursing, in conjunction with the district hospital, provided two basic training courses. There was a three-year course leading to registration as a nurse, and a two-year course leading to enrolment status. In September 1990 a new integrated diploma in higher education and registration course was commenced. This new approach to the
education of student nurses granted them ‘true’ student status. Although students were still allocated to clinical areas for practical experience, they now had supernumerary status, and were therefore no longer included in the overall staffing numbers of the working area. However, this new scheme of training required qualified staff in the clinical learning areas to act not only as teachers and mentors, but also as assessors for the students’ practical skills. According to the English National Board (E.N.B. 1988) the trained nurse needs to ‘.. guide, assist and support students in learning new skills, adopting new behaviours, and acquiring new attitudes’. In principle this ‘mentorship role’ can be viewed as that of a trusted adviser, but in practice it also involves the assessment of student progress. This situation impinges upon the mentee-mentor relationship and creates conflict in the role expectation of the staff nurse. The E.N.B. has therefore recommended separation of the mentor and assessor role so that the mentor is not involved in assessing their own students. However, as previously indicated, the number of permanent, full-time, qualified staff in the clinical area has been considerably reduced, therefore this recommendation has been found difficult to implement successfully. The need to act as mentor, teacher and assessor, has also resulted in a considerable expansion of the staff nurse role and thus placed even greater demands on these qualified nursing staff in the clinical learning environment.

At post-registration level the United Kingdom Central Council for Nursing, Midwifery and Health Visiting (U.K.C.C.) implemented standards for post-registration education and practice (PREP) in 1995. The purpose of PREP is to improve
standards of patient and client care by ensuring that nurses continue to maintain and develop their professional and academic standards following their initial registration. All qualified nurses now need to undertake a minimum of five days of study every three years, without which they will be unable to re-register. Many nurses are keen to undertake further educational courses, as they consider that they are falling behind the newly qualified staff nurses, who have both a diploma in higher education and registration as a nurse. However, the need for nursing staff to maintain and develop their academic and professional knowledge is creating much anxiety for them. Although full-time staff may be seconded to attend courses, a cost-cutting managerial strategy is to expect them to complete the relevant number of study days in their own time. Personal experience as a tutor indicates that this tends to increase staff stress even further.

It is therefore apparent that the changes which have, and still are, taking place in the National Health Service are placing more demands upon employees without necessarily providing the resources or support needed to meet those demands. This situation is particularly noticeable in the clinical environment among 'front line' staff who are in direct contact with patients. It would appear from this overview that there are ample reasons to suspect that stress may be a factor which could affect the relationship between qualified staff and student nurses in the clinical learning area. The relevance of these aspects in the generation of stress for the staff is discussed in the next section.
2.4 Theoretical aspects of stress and coping in a nursing context

Despite the numerous potentially stressful aspects associated with working in the clinical environment, my original discussions with staff found that although they appeared to be exposed to a similar range of potential stressors, some regarded themselves as stressed whilst others did not. This is probably best explained by applying the transactional model of stress and coping proposed by Lazarus and Folkman (1984). They proposed that the degree of stress or strain which results from a situation or event is not due solely to the intensity of the stimulus, nor the resources of the individual, but depends upon the relationship between them, and the individual's interpretation of them. According to Lazarus and Folkman (1984) the individual initially carries out a primary appraisal of the situation or event to determine whether any threat to their physical or psychological well-being exists, for example a student nurse is driving home after a late shift when she feels the car behind is following her too closely. If the stimulus is identified as a potential threat Lazarus and Folkman (1984) suggest that secondary appraisal is undertaken by the individual to determine what resources and options are available to eliminate or reduce (i.e. cope with) the perceived threat. For example in the case above the nurse may decide to take the next turning left, or drive to the nearest petrol station. As coping actions are employed and the situation changes, reappraisal is undertaken to determine the success or failure of the actions taken, and behaviour altered as required. According to Lazarus and Folkman (1984) when a match exists between the demand and the coping resources of the individual, successful elimination of the threat occurs,
for example the car behind does not attempt to follow her into the petrol station courtyard. If the individual perceives a mismatch between their coping resources and the demand - for example the car behind continues to ride her bumper, and still there is no sign of a turning or a petrol station - they usually perceive themselves to be 'stressed'. It is suggested by Lennon (1989) that the appropriateness, labelling and management of emotions, which have been derived from a situational event, are governed by the norms of the social culture of the individual. Emotions are therefore, in part, socially constructed.

Moos (1986b) suggested that cognitive appraisal of a threat is likely to be influenced by three main factors, each of which interact with the other to determine coping actions. Firstly there is the background of the person. Individuals will have been exposed to different parenting styles, level and type of educational experience, peer relationships, different life events, together with the success or failure of previous coping endeavours, such as successful completion of an academic course. Secondly the perception that a threat exists is likely to depend upon the context in which the event occurs. For example a stranger holding a knife may be construed as a threat if it occurs within the person’s home environment or in the out patient’s department, but it would not be considered a problem in the butcher’s shop. Thirdly the threat depends upon the physical and social environment of the individual, both of which may provide the individual with resources which may help in the coping process - for example social integration into the working group will provide security for the new member of staff.
Based on work by Lazarus in 1966, Lazarus and Folkman (1984) proposed that coping fulfills two major functions. It either alters the relationship between the actual and perceived demands of the situation and the resources available, or it alters the emotional response of the individual to the situation. The former is referred to by Lazarus and Folkman (1984) as problem-focused coping, and the latter as emotion-focused coping. Problem-focused coping approaches require direct behavioural or cognitive action, and are directed towards changing the relationship between the demands and the resources available - for example shortage of staff due to sickness may require the nurse to decide that patients will not be bathed today but instead have washes only.

The term ‘emotion-focused coping’ would appear to indicate a psychoanalytic influence since its primary aim is to reduce emotional tension and thus alter the emotional response of the individual to the situation. In practice it is highly likely that both problem-focused and emotion-focused strategies are used to various degrees in conjunction with each other. What appears to be important is the success or failure of their outcome. Behaviours and cognitive coping strategies which successfully remove, reinterpret or reduce an actual source of threat, are usually referred to as adaptive. They have successful outcomes and enable people to meet further challenge with a sense of achievement and optimism. An investigation into the coping strategies used by 360 families in response to a personal crisis or stressful life event was carried out by Billings and Moos (1981). Problem-focused behaviours or cognitions which were most adaptive included attempting to find out more information by talking to
knowledgeable others, including professionals; making use of social support; taking positive action; and using past experiences to consider alternative ways of dealing with the situation. Billings and Moos (ibid.) also identified various emotional-focused responses which could be either considered adaptive or maladaptive. Adaptive approaches, whereby realistic reinterpretations and effective actions were involved, included praying for guidance, or trying to see the positive side of the problem. Although severe stressors may in the short-term mobilize adaptive coping efforts of the individual, Moos et al (1990) found that when severe stressors persist individuals gradually lessen the use of adaptive coping approaches, and instead increase their reliance on maladaptive responses.

Maladaptive approaches fail to address the underlying problem and may, in the long term, make the problem worse. This may result in problematic outcomes either for the individual concerned and/or for others. Maladaptive emotion-focused strategies were found by Billings and Moos (ibid.) to involve avoidance of the problem. This was carried out by eating more, keeping problems to themselves, and engrossing themselves in work to avoid thinking about the problem, whilst other maladaptive approaches involved an alteration in the level of conscious awareness by the increased use of alcohol or drug intake. The distinction between adaptive and maladaptive approaches is not always entirely clear cut since the outcome may vary depending on whose view point is taken, and whether a short or long point of view is selected.
2.4/1 Active coping strategies

According to Lazarus and Folkman (1984) problem-solving approaches encourage the individual to redefine events so that they appear non-threatening, and can therefore be considered a challenge rather than a problem. Findings by Billings and Moos (1981) suggest that individuals who used problem-focused coping strategies not only attempted to solve the problem, but also achieved control. Therefore potential problems could be perceived, by some people, as opportunities for personal growth.

For example a young female nurse who is confronted by an aggressive relative may appraise the situation as threatening. However, if a secondary cognitive appraisal determines the fact that there is a male nurse on duty and the help bell is close-by, or the nurse has been taught how to defuse such situations, the nurse may not regard the situation as stressful but may consider it a challenge and feel optimistic about the outcome. The nurse may consider that personal gain could be achieved by practising what has been taught and attempt to defuse the situation, yet knowing there are back up resources available should this approach fail. By managing the external or internal demands which were initially appraised as threats the nurse would be regarded as coping effectively, and personally could feel she was in control of the situation. However, if the nurse then realises that the male nurse has gone to coffee and she does not know how to deal with the situation herself, the situation, which was initially appraised as a challenge, may develop into a threat. The event is then viewed as stressful, and feelings of anxiety and fear result. According to Steptoe (1991) pessimism about a successful outcome also
influences the coping response, thus emotional feelings of anxiety and fear are intensified still further.

An alternative active problem-focused approach is to seek out information related to the threatening situation. A study by Tymms (1995) into the problems experienced by nurses when a local specialist hospital was decommissioned, suggests that those who sought out information experienced high stress in the short term. However, long term adjustments appeared to be more effective among these information seekers, than those who did not initially seek out information regarding the closure of the hospital.

Seeking social support can also be regarded as an active behavioural strategy. Hobfoll (1988) defines social support as "social interactions or relationships that provide individuals with actual assistance or that embed individuals within a social system believed to provide love, caring or a sense of attachment to a valued social group or dyad" (p121). The present system of the "flexible firm" (Buchan and Thomas 1993), whereby there is only a small core of permanent staff, means that individuals rarely get to know each other well as they are 'diluted' by bank and agency staff. Potentially neither the permanent staff nor the transient staff are encouraged by this employment arrangement to feel part of a social group. Therefore, social support for nursing staff from within the work environment may be more limited in the 1990's than in previous decades. Consequently, nurses may be prone to increased stress in the absence of social support with its stress buffering effects. However, even if a nurse works within a team and appears to have a wide social support network, it should not be assumed that this
necessarily provides much social support. Hobfoll (1988) argues that much depends upon the nature of interactions which occur in the social relationships, and how they are evaluated by the person in terms of their degree of supportiveness. Findings by Moos et al (1990), suggested that social support alone is not sufficient to manage a stressor. It needs to be used in conjunction with another active approach if a positive outcome is to be achieved.

House (1981) and Thoits (1986) consider that social support is actually available in three formats - actual, informational and emotional. However, if the stress-buffering effects of social support are to be effective Cohen and McKay (1984) suggest they should be consistent with the needs of the individual. Therefore in the clinical situation when a nurse arrives on duty and finds that two of the four staff who should be there are off sick it is actual support which is required in the form of extra staff. However, prior to an examination a student nurse may want the staff nurse to teach and thus provide informational support. Should the student nurse fail the examination, emotional support - a shoulder to cry on, somebody to listen to them, somebody to reinforce their worth - will be required. Providers of such support may also differ according to the context and content required. For example a nurse may prefer to get informational support for her future career from the ward leader or clinical link tutor, seek emotional support from close colleagues, and get actual help within the working area from any colleague who is available. Therefore social support or access to counselling services is important for individuals who use emotional-focused coping strategies.
2.4/2 Avoidance coping strategies
Although problem-solving approaches are used by nurses in their work, an overwhelming accumulation of potentially taxing demands may cause the nurse to resort to an avoidance of the situation. This can be achieved by the use of a task-based approach to care, which reduces the concentration and effort required by the nurse and thus the level of demand placed on that individual.

Avoidance strategies, including repression, denial, and the use of various displacement behaviours (disguised as nail-biting, leg swinging and even vigorous physical exercise) can be considered maladaptive. Although Dean and Surtees (1989) found that in the short term avoidance and thus the denial of the problem resulted in the individual feeling more emotionally positive, studies by Rosenberg et al (1987) and Moos et al (1990) suggest that in the long term there is a tendency for avoidant coping strategies to ultimately result in depression.

Work demands are likely to create stress for nurses, although it is often the coexistence of other concurrent life stressors, such as a divorce or moving house, which ultimately overload the coping resources of the individual. Even daily hassles at home, including collecting children from school and organizing baby minders, with which the individual normally copes well, can potentially interact with work related stressors and reduce the likelihood of successful coping. Where there is a negative balance between perceived stressors and resources, the whole scenario is then perceived by the individual as very stressful.
Theoretically it would appear that stress for individuals working in the same clinical areas should be very similar, but ultimately it is the uniqueness of each individual which allows some to cope whilst others do not. Persistent inability to cope with the demands may eventually result in ‘burnout’. According to Pines et al (1981) burnout consists of mental and physical exhaustion, erosion of spirit, general demoralization and emotional detachment, and the individual appears chronically anxious and depressed. Emotional states, which accompany this, include an appraisal of harm, threat and challenge are also apparent - for example anxiety, anger, and irritability. The causality of these emotions is considered by Lazarus and Folkman (1984) to be bidirectional. Therefore, the nurse with major problems in their work life may go home feeling irritable, annoyed, anxious or upset. Lack of social support within the work area may encourage the individual to seek such support in their home environment. However emotional states such as these are likely to have an adverse affect on the social support networks which are available for this individual. Thus the nurse returns to duty the next day still feeling in the same or a worse physical and emotional state. A working environment which presents the individual with constant change and uncertainty, inadequate resources, lack of support and excessive workloads would appear to increase stress of those who work in it, and may eventually lead to burnout (see Figure 1). The result in a clinical work area may be that the nurses experience constant feelings of tension and irritability, and are unable to respond adequately to the changing conditions and demands of the organization. Adverse emotions continue to be pent-up, which Maslach (1976)
considers may cause the individual to enter a state of chronic stress and eventually burnout.

Maslach (ibid.) considers the emotional numbness, which results from this type of scenario, provides the individual with an escape from the perceived stress associated with the job, and thus permits the individual to continue working.
Hochschild (1983) considers that the emotional numbness creates an estrangement between the true self (the caring individual) and the present self, which causes yet more stress to the individual. Although the emotional numbness may permit the nurse to carry on working, the effect of this on patients is that care is carried out in a ‘depersonalised’ manner, which will ultimately reduce the quality of patient care which is provided. Student nurses will not only be exposed to poor quality patient care, but they are also likely to be treated in a similar depersonalised manner. The latter may result in their considering that qualified staff are not approachable or helpful. Although many people get job stress Muldary (1983) suggests that none experience burnout without job stress.

Student nurses working in the clinical environment are not only exposed to similar work stressors as the qualified staff, but they are also subjected to other stressors which are specific to their role as learner. Therefore the next section deals specifically with the learning experience and the stressors which are unique to the role of learner.

2.5 The Learning experience
Since the introduction of a combined Diploma in Higher Education and Registered Nurse training course (Project 2,000) the system of nurse education within the United Kingdom has involved an integrated approach of theoretical knowledge and practical skills. It is during their clinical allocations that the development and testing of the students' knowledge and skills take place. Therefore it is important that these practical experiences should be undertaken in
areas where quality care and facilities for the patients are available so that optimum learning takes place. (English National Board 1988).

The ability to function efficiently as a professional nurse is also dependent on the development of the individual's self-confidence. This can only be achieved by the student trying, and mastering new role skills, and thus overcoming their feelings of incompetency. According to Knowles (1990) adults “learn new knowledge, and understand skills, values and attitudes most effectively when presented in the context of application to real life situations” (p61). The clinical situation is therefore a very important learning area for student nurses, where the five skills associated with the learning process - motor, verbal, intellectual, cognitive and attitudinal aspects - can be fully developed.

Two main approaches to the phenomenon of learning are used by educationalists - the pedagogical style and the andragogical style. The pedagogical style of teaching assigns full responsibility to the teacher as to when, how and what is to be learned. It has a tendency to equate 'learner' with 'dependant', and is therefore mainly employed in primary and secondary education. Knowles (1990) developed an alternative approach for adults - the andragogical style of learning. This is based on the belief that adults have a deep psychological need to be seen by others as capable of self-direction. Within the academic setting learning contracts are used to encourage students to determine their own learning areas. This approach enables students to set their own learning objectives, and encourages responsibility for their own learning.
The andragogical approach may be a suitable method within the academic setting, but once in the clinical setting the student is usually directed in the care which is required to be carried out. Although theoretically the students have been taught to use problem-solving approaches to their work, when in the practical situation they are often required to act according to instructions given by the more senior nurses. Knowles (1990) argues that the desire to be self-directing and the reality of having to be directed can create much internal conflict for the student. Kramer (1974) considered that this conflict between theory and practice results in a "reality shock" for the students when they move from the academic environment to the clinical area. Although students may experience a difference in what they have been taught and the way it is carried out in practice, personal experience has shown that the true reality of nursing in the clinical situation does not usually occur in the earliest part of training. According to Veninga and Spradley (1981) individuals entering a professional career usually experience a 'honeymoon phase' during which time they view the environment through rose coloured spectacles. Therefore, the reality of their chosen career does not become apparent for the first few months. Personal observation suggests that student nurses do not seem to realise the full implications of their chosen career until late first year/early second year or, in the case of those now undertaking the combined diploma in higher education and registration, not until their middle/late second year. It is at this stage that most students appear to go through a stage of 'second year blues'. This is recognized by teaching staff as involving a lack of confidence, feelings of depression, and general disillusionment with the profession. The students appear unable to accept the realities of the
situation, they indicate they want to change and improve every aspect, but also feel they cannot do so. Once through this phase, which appears to last from a few days to several months, the student starts to accept the fact that their chosen career has areas which cannot be altered as well as those that can. The student then appears to gain in confidence during the last part of the course.

To support the student during their clinical allocation, each student is linked with a qualified nurse, who acts as teacher, role model and mentor. This collaboration between the student and the trained staff is considered by Lewis and Deans (1991) to be vital for the socialization of the learner into the profession. The qualified mentor is the facilitator of learning, with the personal relationship providing the critical element of the role. According to Tough (1979)

"...the ideal helper is warm and loving. He (sic) accepts and cares about the learner and about his project or problems, and takes it seriously. He is willing to spend time helping. He is approving, supportive, encouraging, and friendly. He regards the learner as an equal. As a result of these characteristics the learner feels free to approach this ideal helper, and can talk freely and easily with him in a warm and relaxed atmosphere...the ideal helper is probably an open and growing person, not a closed, negative, static, defensive, fearful, or suspicious sort of person"

(Tough 1979 p 195-197)

However, not all qualified staff appear to be of such a disposition, it having been identified by Hyland et al (1988) that
more than half the students in their study were not made to feel 'at home' by the staff in the clinical learning area.

To ensure student nurses have achieved the practical experience required for registration as a nurse, they are required, during their course, to move to a different clinical area every few weeks. Although findings by Kleehammer et al (1990) suggest that 'moving wards' creates much anxiety for students, Jackson and Neighbors (1988) argue that it is the attitude of the staff which ultimately 'makes or breaks' the situation for the student. Although findings by Hyland et al (1988) and Lindop (1989) indicate that in particular it is the negative attitudes of the staff which cause the most internal stress for students, findings by Orton (1981), Ogier (1982) Fretwell (1985), and Smith (1988) suggest that stress of students can be minimised by the presence of good staff-student relationships within the clinical learning environment. It would therefore appear that positive behaviour and attitude of qualified staff in the clinical learning environment are paramount if students are to gain the most benefit from their clinical allocations. However as the attitude and behaviour of staff in the same clinical area tended to correlate Hyland et al (1988) suggested it is these two aspects which form the basis of the atmosphere in the working environment, and ultimately cause the differences which are perceived by students in the various clinical learning environments.

During their clinical allocations students not only acquire knowledge and skills, but they also internalise the values and norms of the profession. However students do feel vulnerable during these allocations. Although findings by Campbell et al (1994) suggest this is partly due to the fact students are
learning to care, the learners are also concerned about the reaction of trained staff to their efforts. Kleehammer et al (1990) also suggest that students are afraid of making mistakes in their work, and thus tend not to take risks in their decision making and nursing care. However caring for clients requires nurses to use discretionary judgement which, by implication, means risks are taken albeit they are founded on the knowledge of the individual nurse. Unless students are supported by staff with positive attitudes and behaviour, and are accepted as a member of the nursing team, it is unlikely that students will learn and develop new practical skills. Thus students, already feeling stressed by the environment, may prefer to be relieved of any decision making within their work. They will therefore fail to gain confidence, which can result in lowered assertive levels, and students will not project themselves into the professional role. Unless the student is able to identify themselves as a nurse within the nursing profession Flagler et al (1988) considered the student may have little incentive to stay in nursing. Although findings by Birch (1979), Campbell (1985) and Lindop (1989) suggested that students leave the profession due to the internal stress created by negative staff attitudes, it could also be argued that students experiencing such internal stress were unable to identify themselves as a professional nurse and therefore left nursing.

The student’s perception of the clinical learning environment appears to be enhanced by qualified staff who have a good interpersonal disposition. Although Orton (1981) and Hyland et al (1988) found that it is the attitude and behaviour of the ward sister/charge nurse which is the major determinant of ward preference by the student, Fretwell (1982) argued that it is the
amount of teaching, carried out by the ward sister, which actually enhanced the student’s view of the clinical learning environment. Although these studies were carried out in the early 1980s’ Yuen (1991) found that the creation of the learning milieu still relies on the clinical area leader (formerly ward sister/charge nurse). This individual serves as a role model in the development and maintenance of a working environment which provides a conducive learning environment for all grades of staff.

Students, similar to qualified staff, can experience much satisfaction from various aspects within the clinical learning area. In particular satisfaction within the working area has been found by Roberts (1980) and Reed (1988) to be associated with patterns of care which encourage direct communication and thus by implication close emotional involvement with clients. Although students may be too inexperienced to be delegated full responsibility for the total care of individuals, Bucknall and Thomas (1996) found that autonomy is present even within single tasks. Students may therefore be given responsibility and thus get job satisfaction from tasks which form part of the overall care of clients. Conversely the undertaking of tasks as isolated aspects of care is considered by Lyth (1988) to lack professional credibility and thus may be considered by students to be an unsatisfactory approach for use in learning areas. Whilst students may gain job satisfaction from different patterns of patient care, Smith (1988) found that it is the relationships which students form with qualified members of the nursing team which provides them with the greatest satisfaction.
Due to their changed role, the clinical area leaders are probably no longer able to give the same level of support and teaching to the students as they previously did. This role now lies with the staff nurse. However, as indicated earlier in this chapter, staff nurses are now experiencing much greater workloads, lack of resources, and lack of support from the ward leader. Qualified nurses working in clinical areas are already experiencing increased stress, and students add yet more stress to their job. According to Wiener (1989) stress is contagious, therefore transactions between qualified staff and students may result in the latter also experiencing high stress. This may be further increased for the student by the conflict between their role as student and that of becoming a professional nurse. Ultimately an environment may be created which is antithetical to the goals of student learning.

2.6 Summary
The above discussion appears to indicate that there are good reasons to support a relationship between the stress perceived by qualified staff and the satisfaction that students experience with the clinical learning environment. Although various studies have been carried out which investigate areas of stress for nurses, and others have looked at student satisfaction, none prior to the commencement of this study in 1989, appear to exist which directly examine the affect of perceived stress of trained staff on the perceived satisfaction which students get from the clinical learning environment. This study was therefore undertaken in an attempt to address this issue. The following chapter identifies the methodological issues which determined the approach to the study.
3.1 Introduction
In order to measure whether any relationships existed between the perceived stress of qualified staff and the satisfaction students experienced with the clinical learning environment, it was decided to utilise a survey approach using published test measures to assess:

1) stress of qualified staff in the clinical environment,
2) satisfaction students had with the clinical learning environment,
3) the role of perceived emotions of qualified staff and students which were present at the time of completing the appropriate tool indicated in 1) and 2) above

In 1989, when the study commenced, several published tests were identified which might have been used to achieve these objectives. The Maslach Burnout Inventory (Maslach and Jackson 1981) and The Work Environment Scale (Moos 1986a) were considered as methods of assessing the stress in trained staff. The Ward Learning Environment Rating Questionnaire (Fretwell 1985) was identified as a potential tool with which to assess the satisfaction students had with the clinical learning environment. The Beck Depression Inventory (Beck et al 1961), The State Trait Anxiety Inventory (Spielberger et al 1977), and Profile of Mood States (Lorr and McNair 1984) were considered as potentially useful to determine emotions experienced by qualified staff and students. Each of these tests are discussed in the following sections.
3.2. Assessment of Stress in Qualified Staff

In order to identify stress in qualified staff in the clinical environment, two tools were identified which appeared to be suitable - The Maslach Burnout Inventory (Maslach and Jackson 1981) and The Work Environment Scale (Moos 1986a).

The Maslach Burnout Inventory (M.B.I.) was designed to measure hypothetical aspects of the burnout syndrome. Initial development of this tool was carried out among people who dealt directly with the public about issues which could be personally problematical (for example health issues, social problems), and is therefore of direct relevance to nurses. Factor analysis was used to produce the final version of the M.B.I. Three sub-scales were identified - emotional exhaustion, lack of personal accomplishment, and depersonalization, each of which contributed to the stress/burnout process. Each of the three sub-scales consists of several items, with each item measured according to its frequency and intensity. Therefore the identification of a frequently occurring stressor which has a minimal intensity may produce a higher score than a more major stressor which rarely occurs.

Careful scrutiny revealed that the tool contains Americanized expressions such as “I feel like I’m at the end of my rope”, whilst some of the statements appeared to be ambiguous, for example "I deal very effectively with problems of my recipients". Although these expressions could be adapted for use in a British culture, I was concerned with what was meant by the ambiguous statements. For example does the word 'effectively' (in the second example) apply to the person
completing the form and therefore imply they do not get too stressed by the problems of their recipient? Or does it apply to the problems of the recipient and therefore mean that the nurse deals with the patient's problems to the satisfaction of that individual? This is an important issue because a nurse working under stress may consider they are dealing effectively with the problem, but the recipient may not.

The authors (Maslach and Jackson 1981) do not consider burnout as a dichotomous variable which is present or not. Rather the score of the individual is placed on a continuum between more burnt out and less burnt out. Furthermore, as no cut off point is indicated, it implies that all individuals are experiencing some form of burnout, be that severe or mild. It is therefore impossible to determine whether the state of burnout which has been reached is actually stress, strain or total burnout. No positive items were included in any of the subscales, therefore adaptational outcomes, such as perceptions of achievement and challenge, could not be ascertained.

Another important problem was related to the actual administration of the questionnaire. Maslach and Jackson (1981) stated that this should take place in the presence of an examiner, who has to ascertain that every question is completed, otherwise the authors regard the result as invalid. As the intended survey was to take place in a local District Hospital, which was spread across various sites situated several miles apart, it was anticipated that difficulties would be experienced by the staff who had volunteered to complete the test if they had to attend a central site. The location of suitable accommodation proved to be a major problem, thus consideration was given to adapting the M.B.I. for self
completion. However, as I was concerned about administering such a negative scale without the opportunity for debriefing respondents, this idea was not followed through, and an alternative tool was sought.

The Work Environment Scale (Moos 1986a) was reviewed and found to be a useful tool in identifying the social structure within the clinical environment and, by implication, associated stressors. However, although it has a comprehensive structure consisting of ten sub-scales, there is a total of ninety questions. Moos (1986a), like Maslach and Jackson (1981), advises that administration of this test should be carried out in the presence of an examiner who needs to ensure that each page is correctly completed, otherwise results of the test are regarded as invalid. Thus the employment of the Work Environment Scale (W.E.S.) would result in the same administrative problems as outlined above for the M.B.I. Again consideration was given to adapting the scale for self completion, however it was deemed that the length of the scale (90 questions) may not achieve a reasonable response rate. Added to this at the time of commencing this study no normative data for the W.E.S. existed for the United Kingdom. This was rectified after the time of this study by Baker et al (1992), who found that nurses (N=209) in the United Kingdom perceived themselves as having higher levels of autonomy, work pressure, and task orientation, but less supervisor support than qualified nurses in North America. Reasons for the differences were not identified.

Dissatisfaction with the M.B.I. and the W.E.S. led to the decision to develop a tool for the assessment of qualified staff stress which would be more appropriate for the aims of this study, and which could be carried out using a postal survey
approach. The criteria for such a tool, based on those which existed, were that it should be easily completed, non-ambiguous, relatively brief and contain a balance of positive and negative items. It was felt that adherence to these criteria would ensure the tool was user-friendly, which would therefore encourage respondents to complete all items and return the questionnaire without supervision.

3.3 Assessment of student satisfaction with clinical learning environment
In order to identify student satisfaction with the clinical learning environment the most appropriate tool appeared to be the Ward Learning Rating Questionnaire (Fretwell 1985). The tool is based on previous work by Fretwell (1982) which used students' opinions to form the basis of the questionnaire, and contains elements of Orton's (1981) work related to 'high student orientated wards'.

Both the Ward Learning Rating Questionnaire (Fretwell 1985) and the audit tool already in use in the School of Nursing, were found to include a number of similar aspects which related to the management of patient care, availability of teaching, and learning resources. However Fretwell (ibid.) included several items associated with ward atmosphere/staff relationships, which the audit tool did not. Rather than only using this section in conjunction with the audit tool, it was decided to discuss the content of the Rating Questionnaire with the students, who would ultimately have to complete it. Four student focus groups were set up with the specific remit to examine the Ward Learning Rating Questionnaire (Fretwell 1985). These focus groups consisted of:-
a) one group of first year students (N=13),
b) one group early second year (N=14)
c) one group late second year (N=15)
d) one group mid third year (N=11)
All students were undertaking a course leading to RGN.

Copies of the Ward Learning Rating Questionnaire were
distributed and discussed. Comments from the students
revealed certain aspects which they considered needed to be
more fully developed. These were particularly those which
related to the style of leadership employed within the clinical
learning environment. Based on these comments, it was
decided to reject the Ward Learning Rating Questionnaire
(Fretwell 1985), and instead design a new tool which would
specifically assess the satisfaction students had with the
clinical learning environment. The criteria for this tool were that
it should not be lengthy, or ambiguous, should include aspects
which students considered important, and should complement
the present audit tool.

3.4 Assessment of Emotional state
It was identified in the previous chapter that an appraisal of a
situation gives rise to various positive or negative emotional
states. Stress appears to be associated with negative
emotional states, which are sustained in the face of chronic or
persistent stressors, but successful outcomes when dealing
with challenging situations appear to be associated with
positive emotional states. In my original discussions with the
staff, feelings of anxiety, tension, anger, frustration, and
exhaustion were apparent in some areas, particularly those
where staff perceived themselves as stressed. However some
staff appeared to regard work as a challenge and did not consider themselves stressed. These individuals appeared to experience positive emotions which included feeling happy, satisfied and confident. Most of the expressed emotions appeared to be a direct result of individual responses to the work situation. However, some of the resultant emotional states appeared to be strongly associated with the quality of interpersonal relationships in the work area, for example appreciated, valued, or lonely, and relied on feedback from other people.

It was decided to include an assessment of emotional response in the study in order to identify whether there was a relationship between:

- a) perceived stress in qualified staff and their expressed emotions
- b) perceived satisfaction in students with the clinical learning environment and their expressed emotions.
- c) the emotions of students and qualified staff from the same clinical areas

Many of the tools developed for the measurement of emotional states have been aimed specifically at detecting common psychiatric disorders such as depression and anxiety, although some of them have been used in a variety of studies related to stress and coping.

The Beck Depression Inventory (Beck et al 1961) is one of those most commonly used. It aims to measure a number of attitudes associated with depressive states - e.g. social withdrawal, dissatisfaction, - although the majority of the scales have a somatic bias. The design of the tool was based on the
authors' observations of samples of depressed patients attitudes and symptoms while undergoing psychotherapy. This resulted in a 21-item inventory, although later Reynolds and Gould (1981) condensed this to a 13-item inventory. Both versions are intended to measure the severity of depression, and do not incorporate other emotions including positive ones. The Beck Depression Inventory (ibid.) was felt to be inappropriate because of this negative bias.

The State Trait Anxiety Inventory (Spielberger et al 1977) has a user-friendly format and a total of 40 statements, each rated on a four-point scale. The state part of the questionnaire requests respondents to complete 20 statements indicating how they feel "right now", whilst trait dispositions are identified by respondents completing 20 statements on how they "generally" feel. Although the trait disposition of the individual may stay constant, the state of the individual will differ according to their situation. Therefore completion of the statement for example "I lack self-confidence" will potentially result in different state answers depending on whether the individual completes it at home or at work. However, the State Trait Anxiety Inventory (S.T.A.I.) only measures anxiety. It does not include emotions commonly associated with burnout. Some negative emotions expressed by staff, for example frustration, would not be identified by the use of the State Trait Anxiety Inventory (Spielberger et al 1977). Added to this the S.T.A.I. lacks positive items. The S.T.A.I. was considered to be inappropriate for the objectives of the study, so its use was rejected.

The Profile of Mood States Bi-polar form (POMS-BI) by Lorr and McNair (1984) was constructed to measure six bi-polar subjective mood states - composed-anxious, agreeable-hostile,
elated-depressed, confident-unsure, energetic-tired, and clearheaded-confused. Each scale consists of 12 adjectives, therefore the whole test comprises 72 adjectives. Each adjective is rated on a four-point scale from “much unlike this” to “much like this”. As the test measures both the negative and positive effects of mood states and feelings it is applicable for use with ‘normal’ people as well as those suffering from psychiatric disorders. It therefore seemed most promising as a general measure of mood. Two forms of POMS -B1 exist, each with a distinct time set. One asks the subjects to rate their feelings “right now”, and the other rates feelings according to how the individual has felt “during the past week including today”. The intention of this one week rating is to evaluate changes in patients seen in once-a-week clinics.

Although this inventory uses adjectives, rather than phrases which were used in the State Trait Anxiety Inventory (Spielberger et al 1977), bias could still result depending on the environment where the individual completed the test. Some adjectives - for example “uncertain” - would tend to be rated differently according to the environment in which the individual was. If completed in home surroundings most ‘normal’ individuals would complete this using “much unlike this”, however if completed in the clinical environment by a student new to the area it would probably be completed “much like this”. Instructions would therefore need to indicate to which environment answers should be related, otherwise confusion could result.

It has been identified that some positive emotional states reflect interactions between individuals (for example positive feedback from a senior individual on a job well-done can help a
staff nurse or student feel appreciated or valued), but there is no provision in this inventory for these types of socially constructed emotional states. To ascertain whether the POMS inventory (Lorr and McNair 1984) suited the needs of staff and students, focus groups were set up to consider this issue.

Focus groups of qualified staff (N = 18) were formed within four general nursing clinical areas. The student focus groups were those already described in section 3.3. of this study. It was explained to each group that the POMS inventory might be used in a study of nursing staff, and hence constructive comments about its format and content would be gratefully received. Students and qualified staff were then presented with the POMS inventory. Comments from all the focus groups were collated. These revealed that both staff and students considered emotions resulting from socially constructed emotional states (for example interpersonal relationships) would form an important aspect in the data collection. It was therefore decided that the Profile of Mood States (Lorr and McNair 1984) was not appropriate to the objectives of the study. A decision was made to design a tool appropriate to the needs of the study. Based on the inventories reviewed the criteria for this tool was that it should consist of both positive and negative adjectives, instructions for completion should indicate that emotional states relate to the workplace, and a simple format should be used rather than choosing ‘a tendency towards’ or ‘away from’ an emotion.

3.5 Changes to the Original Format of the Study
The original intentions of the study had been to utilise published tools to assess the perceived stress and emotional states in
qualified staff and compare them with the perceived satisfaction and emotional states of students in the clinical learning environments. Due to the lack of suitable tools for the objectives of the study a decision was made to change this original format. Instead of using a deductive survey approach based on previously published tools it was decided to utilise an inductive approach. As the inductive approach allows for observations and data collected from the participants to be developed into a theory, the approach is firmly embedded in the experience and observations of the participants. If stress and coping are due to a transactional process between the individual and their environment, the employment of an approach which utilizes the experiences of the individuals concerned would appear to be an appropriate method. Development of suitable scales would be based on those reviewed. Therefore, the aim of the initial part of the study was to focus on the nature of stress among qualified staff and its effects on student satisfaction in the clinical learning environment.

The revised study was initially planned in two phases:-
1) an inductive method to identify:-
   a) the underlying stressors of qualified staff,
   b) the aspects which students found contributed towards a satisfactory learning environment
   c) common emotional states present among staff and students
   d) develop suitable measurement tools for the three aspects indicated in a, b, and c above.
2) a quantitative survey method, using the tools developed in phase one, to collect data from a wider sample group and identify and measure:-
a) the stress perceived by qualified staff in the clinical environment
b) the satisfaction perceived by students working in the clinical learning environment
c) the perceived emotional states present when completing either a) or b) above.

The next chapter describes the initial induction phase of the study and the design of the measurement tools.
4.1 Introduction
This first phase of the study was aimed at designing and developing tools appropriate to the aims of the study. Whilst it is apparent from the literature reviewed in chapter two that the theoretical understanding of stress is gradually being refined, it is considered that the causes of stress should be examined in the context of the population being investigated. It was therefore decided, similar to studies carried out by Nichols et al (1981), Chiriboga and Bailey (1986), and Dewe (1987), to use an inductive, qualitative approach. These studies were all based on an initial phase which used interviews to elicit from nursing staff aspects which they considered stressful. These were then used to generate a list of work related stressors which formed the basis of a survey questionnaire. Whilst this approach was used in the afore mentioned studies to investigate aspects of stress among nursing staff it was considered that a similar approach could also be employed in the present study to identify the work related stressors of qualified staff, and aspects which students found contributed towards a satisfactory learning environment.

Whilst reviewing the study by Nichols et al (1981) it was noted that part of their questionnaire had a small section of 20 descriptive terms which related to the possible view that a nurse could hold towards her ward, e.g. depressing, supportive, tense, calm. It was considered that a similar approach could be
used within the present study to identify common emotional states among staff and students.

The design and development of tools appropriate to the aims of this study was thus carried out using an inductive approach. During this phase three tools were designed
1) for use by qualified staff to determine the nature of work-related stress they perceived from the identified stressors
2) for use by students to assess the satisfaction they perceived with all aspects of the clinical learning environment
3) for use by both groups of respondents to determine their emotional state at the time of completing either 1) or 2) above as appropriate.

For all three tools the approach advocated by Moser and Kalton (1971) and Oppenheim (1992) was used during the development of these measures. This included assembling a set of items for each tool which, in the present case, were derived directly from groups of potential respondents. Although wording of most of the items was obtained directly from unstructured interviews care was given to ensure the wording of these items was neither vague, ambiguous, complex, or included double negatives. All were attitudinal and did not include factual items as scoring of the latter may have been based on the knowledge of the individual rather than on their beliefs. A pilot study using the three newly developed tools was carried out, after which unsuitable items were discarded. Issues relating to reliability and validity of these tools is discussed in section 4.6

Details relating to the development of the three measures are contained in the following sections.
4.2 Design and piloting of stressor identification scale for Qualified Staff (SSS = Staff Stressor Scale)

Individual, or small group, focused discussions took place with 23 qualified staff working in various general nursing clinical areas, to identify factors which they perceived to be causing stress in their working environment. A total of 27 stressors were identified (see Table 1).

- Staff shortages
- Fluctuations in workload
- Too little time to do what is expected
  - Carrying out tasks outside your level of competence
- Poor quality of support staff
  - Coping with new situations
- Too much work
- Lack of positive feedback about your work
- Shortage of essential resources
- Deciding priorities
- Deadlines and time pressures
- Frustration with conflicting procedures
- Poor physical working conditions
  - Lack of job satisfaction
- Lack of participation in planning/decision making
  - Coping with new technology
- Lack of support from senior staff
- Uncertain about your responsibilities
  - Lack of knowledge/training for present work
- Dealing with aggressive/difficult patients
- Emotional involvement with job
- Lack of appreciation by other staff
- Relationships with nursing members of the caring team
- Working with learner nurses
  - Conflict of roles within the job
- Relationship with peer group
- Dealing with relatives
- Involvement with life and death situations

Table 1 List of Stressors
- = stressors used in final questionnaire
Measurement of the perceived stress which resulted from these stressors was based on the approach employed by Maslach and Jackson (1981). This method included both a frequency score and an intensity score for each stressor. The frequency scale was scored from rarely, monthly, weekly and daily (using a scale from 1- 4). The intensity scale was from slight, moderate, considerable and extreme, again using a 1- 4 scoring scale (see Appendix 1). The final score for each stressor was achieved by multiplying the frequency score by the intensity score. Although the use of this approach treated ordinal data as though it was ratio data, it was only used so that the daily but minimal stress problems, which scored higher than considerable problems which rarely occurred, could be easily identified. It is these daily hassles which Lazarus (1981) considers create the most stress for individuals. (It was only after the study had commenced was it noted that Hipwell et al (1989), who adapted Gray-Toft and Anderson (1981) Nursing Stress Scale to include frequency and intensity scales, found that respondents had been unable to distinguish between these two aspects. Hipwell et al (ibid.), similar to the approach used in the present study, treated the scores as ratio data when they resorted to combining and averaging the frequency and intensity scores.)

Piloting of this tool was undertaken with a sample group of 19 qualified staff in 3 clinical areas - medical, paediatric and gynaecology. This group was composed of full-time and part-time Registered and Enrolled nurses, with an age range of 22-50 years. The verbal feedback from qualified staff indicated that they did not like the format of the stressor questionnaire, and they would prefer a simple 4-point scoring system of 0 - 3 (no problem - major problem). Eighteen variables were
identified as consistently scoring high when the frequency score was multiplied by the intensity score. These were those which were eventually included in the main survey, and the other nine listed stressors were excluded. (see Table 1 and Appendix 2) As the majority of these variables were those which occurred daily they could be regarded as 'daily hassles' rather than specific events. Most of these 'hassles' related to organisational issues (for example lack of resources, high workloads, etc) although some related to the interpersonal nature of the job, e.g. lack of support from senior staff etc.

The reliability of the resultant stress scale was determined using Spearman Rank Correlation coefficient and a split-half analysis. Two scales were formed from the 18 variables based on an alternate number approach. The two scales were found to be strongly related ($r_s = 0.81$), whilst the correlation for the whole test using Spearman-Brown was $r^1 = 0.895$, which suggested all 18 variables related to the same overall concept. It was indicated earlier in this chapter that the content for the stressor tool was derived directly from a sample of qualified staff. Since these staff worked in different general clinical areas bias from any one clinical environment was kept to a minimum. It is therefore considered that content validity has been achieved. Although it is suggested by Moser and Kalton (1971) that two additional aspects - construct validity and predictive validity should be addressed before a scale is accepted for general use, it is considered that the number of respondents in the pilot stage was too small to support these two aspects. These two issues are therefore addressed following the main survey and in the final discussion.
4.3 Design and piloting of Clinical Learning Environment Satisfaction Scale (CLESS)

Whilst reviewing Fretwell's Ward Learning Rating Questionnaire (1985), discussions with four focus groups of students had identified various aspects which they considered should be included in a learning satisfaction tool. Therefore, it was decided to approach various groups of students at different stages of their training for their ideas on the content of such a tool. Discussion with three groups of students (N=54) at different stages of training (9, 18 and 28 months) took place during their study blocks in the School of Nursing. Students were informed of the intention of the study, and requested to meet later in the week if they wished to contribute. At the second meeting students were asked to list words, which in their opinion described both the positive and negative aspects of the clinical learning environment. These students (N=54) were encouraged to discuss these in focus groups as it was felt that this method would create a greater range of words than would otherwise be achieved by an individualistic approach.

These discussions resulted in a high degree of consistency among the words chosen. Most students (N = 41) presented these words as pairs of opposites, the remainder (N = 13) selected single words. This led naturally to the construction of a semantic differential scale (see Table 2). The latter is a rating scale consisting of bi-polar adjectives and is used to measure attitudes. The given concept is rated on a series of scales.

Although most of the words were already paired, a further group of students (N=12) who were mid-way through their three year training, examined and verified the given semantics.
total of 17 semantic differential scales were agreed on by this group of students. A score range of 1 - 7 was chosen by the researcher, with 1 representing the negative end of the scale.

- Learners valued
- Teaching haphazard
- Stressful environment
- Relaxed atmosphere
- Discouraging
- Flexible approach
- Leadership weak
- Helped
- Learners abused
- Apathetic
- Good teamwork
- Uncaring
- Friendly
- Staff unapproachable
- Criticised more than praised
- Learners considered
- Teaching irrelevant

Learners "used"
Teaching planned
Enjoyable environment
Tense atmosphere
Stimulating
Rigid approach
Leadership strong
Abandoned
Learners nurtured
Motivating
Team not united
Caring
Hostile
Staff approachable
Praised more than criticised
Learners ignored
Teaching relevant

Table 2 Semantic differential scales used to determine student nurse satisfaction with clinical learning environment
(see Appendix 3 for full format of questionnaire)

agreed on by this group of students. A score range of 1 - 7 was chosen by the researcher, with 1 representing the negative end of the scale and 7 the positive. The resulting semantic differential scale is given in Table 2. Piloting of the clinical learning environment satisfaction questionnaire was undertaken.
with a sample group of 19 students from three clinical areas - medical, paediatric and gynaecology. All these students were in their second year of training. The age range was from 20 - 24 years.

Feedback from these students indicated that it was an appropriate tool and they did not want any changes made. Reliability of the students' satisfaction tool was tested using a split-half approach. An odd-even number split of the questionnaire produced two scales, the hypothesis being that there was a strong relationship between these two scales. A strong relationship was found, $r_s = 0.92$, $r_1 = 0.95$ which suggested that all 17 semantic scales belonged to the same underlying concept, and demonstrated excellent internal consistency. The validity of the student tool was embedded in the fact that its content was derived from and verified by students. However due to the small number of respondents in the pilot stage the issues of construct and predictive validity were not addressed and are therefore included following the main survey and in the final discussion.

4.4 Design and piloting of the Emotional response Measure (ERM)

During the focused interviews with the qualified staff ($N=23$), and the classroom group sessions with the students ($N=54$), various emotional feelings were mentioned by both groups. These were compiled to form a list of 52 emotional words (positive = 23 and negative = 29). These are given in Table 3. Respondents were asked to circle those emotions which they had experienced during the week prior to completing either the stressor or clinical learning environment satisfaction scale form.
The lists for both groups were identical (see Table 3) and presented for completion at the same time as the appropriate

<table>
<thead>
<tr>
<th>Excited</th>
<th>Desperate</th>
<th>Relieved</th>
<th>Cross</th>
</tr>
</thead>
<tbody>
<tr>
<td>Humiliated</td>
<td>Appreciated</td>
<td>Uneasy</td>
<td>Confident</td>
</tr>
<tr>
<td>Troubled</td>
<td>Stimulated</td>
<td>Happy</td>
<td>Irritated</td>
</tr>
<tr>
<td>Disturbed</td>
<td>Absorbed</td>
<td>Resentful</td>
<td>Delighted</td>
</tr>
<tr>
<td>Thankful</td>
<td>Discouraged</td>
<td>Miserable</td>
<td>Exhausted</td>
</tr>
<tr>
<td>Eager</td>
<td>Ineffective</td>
<td>Encouraged</td>
<td>Helpless</td>
</tr>
<tr>
<td>Distressed</td>
<td>Optimistic</td>
<td>Satisfied</td>
<td>Hopeful</td>
</tr>
<tr>
<td>Terrified</td>
<td>Contented</td>
<td>Weary</td>
<td>Secure</td>
</tr>
<tr>
<td>Frustrated</td>
<td>Insecure</td>
<td>Exuberant</td>
<td>Shocked</td>
</tr>
<tr>
<td>Efficient</td>
<td>Furious</td>
<td>Alert</td>
<td>Worthless</td>
</tr>
<tr>
<td>Vulnerable</td>
<td>Good</td>
<td>Threatened</td>
<td>Tense</td>
</tr>
<tr>
<td>Unhappy</td>
<td>Relaxed</td>
<td>Panicky</td>
<td>Lonely</td>
</tr>
<tr>
<td>Anxious</td>
<td>Energetic</td>
<td>Inefficient</td>
<td>Valued</td>
</tr>
</tbody>
</table>

Table 3  Emotional Response Measure
(see Appendix 4 for full format of questionnaire)

questionnaire indicated above. The intended method of calculating the emotional balance of the individual was to subtract the number of negative words chosen from the positive words. The result would therefore indicate whether the individual was in a positive or negative emotional state. Piloting of the emotional word questionnaire was carried out in conjunction with the qualified staff stressor questionnaire, or student satisfaction questionnaire, as appropriate. This approach ensured that the emotions expressed were directly related to feelings evoked by the clinical environment.

Feedback from trained staff and students indicated that the emotional response measure (ERM) was appropriate so no changes were made. Reliability of the tool appears to have been confirmed by the results (see Table 4) which indicate that as stress in qualified staff increases their emotional balance
becomes more negative. Similarly as student satisfaction with the clinical learning environment increases their emotional balance score becomes more positive. Content validity was achieved as emotional words for the scale were derived directly from a sample of the intended respondents. The predictive validity of this tool is discussed in the final chapter.

4.5 Comparison of Staff stress, student satisfaction and staff/student emotional responses.

Comparison of the mean stress and satisfaction scores of staff within each clinical area indicated that student satisfaction with the clinical learning area appeared to decrease as the stress in the qualified staff increased (see Table 4)

![Table 4 Mean emotional balance, stress and satisfaction scores per clinical area](image)

尽管在情感反应测量中列出的负面词汇多于正面词汇，但每个临床领域的平均情感平衡分数为正。在每个临床领域内，存在一种趋势，即当合格人员的压力增加时，学生对临床学习环境的满意度似乎会下降。
positive emotional balance to be associated with lower
stress in qualified staff, and higher satisfaction for students.
Area A created the lowest stress in qualified staff, whilst
Area C created the highest. Comparison of the stress in staff
from these two areas indicated this was a statistically
significant difference. (U 20, N1 4, N2 5, p < 0.05). This
suggested that, even on the basis of small sample group
size, the designed tool was sufficiently sensitive to detect
differences in stress in qualified staff.

A very strong correlation was found between the individual
stress in the qualified staff and their emotional balance,
$r_s 0.94$. This suggested that lower stress in trained staff was
associated with a more positive emotional balance. These
results not only support the decision not to use the M.B.I. or
one based on negative aspects, but they also suggest that
the ERM may be used as reliable indicator of stress in staff.

Students scored clinical area A as the most positive, whilst
area C was viewed less positively. Comparison of the
individual satisfaction scores of students working in these
two areas indicated that there was no significant difference
between Area A and C (U 7.4, N1 5, N2 8, ns). However,
whilst this may be attributed to the small numbers of student
respondents involved, so too was the staff stressor scale
based on a small sample size, yet that tool was found to
sufficiently sensitive to detect differences in stress levels in
qualified staff. Whilst this finding raises the question as to
whether the student satisfaction scale was actually sensitive
enough to detect various satisfaction levels, it was decided
to reserve judgement until the tool had been tested over a
larger sample group.
A significant correlation was found between the satisfaction of students and their emotional balance scores ($r_s$ 0.73, $N$ 19, $p < 0.05$, one tailed). As student satisfaction with the clinical learning environment increased, there was a tendency for their emotional positive balance to increase. Similar to the findings among qualified staff, this result suggested that the ERM may be used as a reliable indicator of student satisfaction with the clinical learning environment.

4.6 Issues of Reliability and Validity

An issue of concern in the design of these new tools was that of reliability and validity. Each group of respondents (qualified staff and students) were required to complete a two-part questionnaire. One part related to their perceived stressor or satisfaction, and the other to their emotional feelings at the time of completing the afore mentioned. Reliability of both the qualified staff stressor tool, and the satisfaction tool for the students were evaluated in terms of their internal consistency. This was carried out for each tool using a split-half method based on odd-even number approach. Items of each test were split into two half-groups, scored independently, and Spearman Rank correlation coefficient ($r_s$) used to determine the reliability. Spearman-Brown prophecy formula ($r^*$) was then used to ensure the correlation coefficient was an estimate of the reliability for the entire test and not just the half-test.

As information obtained from sample focus groups formed the basis of all three questionnaires content validity was achieved. Although Moser and Kalton (1971) suggest the data obtained during a pilot study should be subjected to
factor analysis in order to explore the structure of underlying attitudes, to select a smaller number of scales for the main survey, and to provide construct validation, this approach was not used in the present pilot study. It was considered that insufficient data would be obtained from the small sample groups for a good factor analysis. A decision was therefore made to assess construct validity using the data obtained from the main survey. The predictive validity of the newly designed tools was not fully assessed until all three phases of the study were completed.

4.7 Discussion
The decision to design tools specifically for this study was based on the fact that none of the published tools which were reviewed were considered appropriate for the intended objectives. Generation of scales and emotional words from focus source groups ensured that the content of the tools was firmly founded on feelings and experiences of the potential respondents, albeit these were from within one NHS district hospital. There was a high response rate which was attributed, in part, to the fact that some of staff and students who were respondents in the pilot study had contributed to the content of the tool. Verbal feedback from staff and students did however indicate that the tools had a ‘user friendly’ format, which may also have been a contributory factor in the high response rate.

The original criteria for the design of the qualified staff stressor tool was achieved in that it must be able to be used in a postal survey, scales must not be ambiguous, it must be easily completed and must not be lengthy. As indicated
above its content was based on information provided by representatives of potential respondents. The reliability, content validity and sensitivity of the qualified staff stressor tool suggested that it was suitable for use in a larger survey. Based on these findings it was decided to use this tool in the main survey in preference to the Maslach Burnout Inventory (Maslach and Jackson 1981) and the Work Environment Scale (Moos 1986a). Although it could be argued that these tools could have been adapted for use, the findings from the pilot phase suggested that the stressor tool would prove to be at least as effective. Added to this its content was directly pertinent to those working in the clinical areas.

The student environment satisfaction questionnaire was found to be sufficiently sensitive to detect various degrees of satisfaction in the three areas piloted. The lack of statistical significance was, in this pilot phase of the study, attributed to the small sample group size, and therefore needs to be addressed when data from a larger group of students is available. Feedback from students did however suggest that the designed tool complemented the present audit, and content was neither ambiguous or lengthy. Based on these findings it was decided to use the tool as designed for the study, in preference to Fretwell's Ward Learning Environment Scale (1985).

The emotional response measure (ERM) was based on the criteria that it should contain positive and negative words, not require the respondent to complete scales, and it should be related to emotions experienced in the working environment. Emotional words, related to socially constructed emotional states were, as requested by the focus group participants,
included in the final format. Although the scoring system and analysis of data used an untried approach, the results of the pilot study suggested that the tool was sufficiently sensitive to detect the emotional balance state of the individual. The strong correlation between the emotional balance scores and the staff stress or student satisfaction also suggested that the emotional response measure had good predictive validity, but this was not fully assessed until all phases of the study were completed. Based on these findings, together with the fact the content of the tool was generated by representatives of potential respondents, it was adopted for use in preference to those reviewed in Chapter 3.

On the basis of the results from the pilot study, together with the fact that no tools had been identified which were suitable for the needs of my study, it was decided to proceed to Phase 2, a quantitative survey. The aims of the second phase of the study were firstly to use the tools developed during phase one to identify the perceived stress among qualified staff, the perceived satisfaction students had with the clinical learning environment, and the emotional balance of respondents. Secondly to assess the construct and predictive validity of these three tools. The next chapter details phase 2 - the main survey.
5.1 Introduction

It has been identified that the organizational changes in the National Health Service have imposed a number of changes in the clinical environments which, together with the changes in student nurse training schemes, are placing more demands upon the qualified nursing staff. These situations and events, occurring within the clinical working area, potentially act as stressors which may result in increased stress for the qualified staff. As students are allocated to various clinical areas during their training, it is possible that increased stress of the qualified staff in these areas may affect the students' perception of the clinical learning area. Based on the literature reviewed, personal experience as a nurse tutor, and the findings from phase one of the study, it was predicted that satisfaction of students with the clinical learning environment would be increased in areas where qualified staff perceived less organisational stress. This phase of the study was thus designed to test the original hypotheses using the tools developed in phase one.
The original objectives of phase two were to:–

a) identify the variations of perceived stress which existed for qualified staff between the various clinical environments

b) test the prediction that there is a relationship between staff stress and students' satisfaction with the clinical learning experience.

However in order to test the validity and reliability of the stressor scale it was decided to extend the survey to include qualified staff from:

1) another district general hospital in the same regional health authority,
2) those working in post-registration learning areas.

Therefore, two more objectives for this phase of the study were included:

- c) test the prediction that, overall, the perceived stress of qualified staff in pre-registration areas would be similar to those working in another hospital in the region.
- d) test the prediction that qualified staff working in pre-registration student training areas will perceive more stress than those working in post-registration training.

5.2 Location of study
Two NHS district general hospitals in the south of England provided the environment in which the study took place. Both hospitals ('A' and 'B') had a catchment area of approximately the same number of clients. Staffing ratios within each hospital were similar, as were the clinical learning environments where students gained most of their clinical experience. At the
commencement of the study a school of nursing was linked to each of the hospitals, but just prior to the survey students from both the hospitals in the study linked to form a College of Nursing. Students who commenced their nursing course after the amalgamation of nursing schools took place, undertook an integrated diploma in higher education and registered nurse training (Dip.HE/RGN). This course was a fore runner for the present Project 2,000 course. Therefore both hospitals had students undergoing RGN, and Dip HE/RGN courses.

Whilst pre-registration students gained practical experience in some clinical learning areas, other clinical areas were specifically used for post registration students undertaking courses in specific nursing specialities, for example care of the person with burns, care of the spinally injured patient, care of the terminally ill patient. Personal observation as a tutor suggested that qualified staff working with post-registration students perceived less stress than their colleagues working with pre-registration students, hence three clinical areas within the local district hospital ('A') were also included in the survey. Each clinical environment was a designated post-registration training area, and only qualified staff in permanent full-time positions were included in the survey.

5.3 Method
A survey approach was used to measure the stress response of the qualified staff and determine the relationship to the students' satisfaction. The tools utilised for this survey were those which were designed and piloted in phase one.

The two part questionnaire for qualified staff consisted of the 18 item staff stressor scale (SSS), and the emotional response
The criterion for inclusion in the qualified staff survey was that pre-registration or post-registration students must be working in the clinical area. Staff completing the questionnaire must have been qualified at least six months, and have been working in that area for a minimum of three months. Respondents would therefore have had the opportunity to adapt to their qualified status and/or their role in the clinical area. In many clinical areas registered and enrolled nurses are used interchangeably, therefore both groups were eligible for inclusion. If potential respondents had been limited to registered nurses only, sample sizes within each clinical area would have been very small. To ensure staff were all potentially exposed to the same level of stress only those working full time were included in the study.

The two part questionnaire for students consisted of the clinical learning environment satisfaction scale (CLESS), and the emotional response measure (ERM). Completion of the student questionnaire was to be undertaken in the final week of allocation to the clinical area. This enabled the student to have had sufficient time to adjust to the area, yet complete the form whilst still being directly affected by the environmental aspects.

5.4 Qualified Staff Sample
All qualified staff who fulfilled the criteria were included in the sample group. This resulted in a sample group of 140 full-time permanently employed qualified nurses -

a) 80 qualified staff working in the areas where the student sample was allocated (hospital ‘A’)

75
b) 40 qualified staff from medical and surgical wards at hospital ‘B’ where pre-registration students were allocated.

c) 20 qualified staff in areas at hospital ‘A’ where only post-registration students were working.

The sample group included a mix of single, married and divorced nurses. Ages ranged from 22 to 58 years. Ten male nurses were included in the sample.

5.5 Student Sample
At the time of carrying out the survey in hospital ‘A’ there were four courses leading to registration as a general nurse (RGN), and one course leading to Diploma in Higher Education/RGN (Dip HE/RGN) recently introduced in the Hospital. A convenience sample of 162 students from hospital ‘A’ was selected. This comprised all students who completed a hospital based clinical allocation during the time the survey was in progress. The sample therefore consisted of students undertaking RGN courses (N=142), and those undertaking RGN combined with Diploma in Higher Education (N=20). These latter students were all from the same cohort. The sample thus included students who had been in training only six months (these were those on the Dip HE/RGN course) up to those who had almost completed the three-year training period. These senior students were allocated to medical and elderly care areas where students on the Dip HE/RGN were also allocated. The majority of the sample group of students were female (N= 151), eleven students were male, only one of whom was undertaking the combined Diploma in Higher Education/RGN course.
5.6 Procedure
Names of all full-time qualified staff who fulfilled the criteria, and were working in pre and post-registration areas in the local hospital, or in pre-registration medical and surgical areas in the other district hospital, were obtained from the off-duty rotas. A list of all students who would complete a clinical allocation during the time the survey was in progress was obtained from the allocation office. An explanatory letter, the appropriate two part questionnaire, and an addressed envelope were sent to all those in both sample groups. The hospital internal mail system was used for distribution and return of forms within the local hospital, and the inter-hospital mail service for those at the hospital 'B'. Students were asked to complete the forms during their final week of allocation to the clinical area. Personal visits to each clinical area in hospital 'A' were made, and brief discussion with various staff carried out, to ascertain whether a primary nursing holistic patient care approach was used or a team/task based approach. No visits were made to hospital 'B'.

5.7 Ethical Aspects
All respondents were informed in the letter of their right not to participate in the survey. Failure to return forms was not followed up as this could have been perceived as an attempt to coerce the individual to complete the questionnaire. Questionnaires were individually coded so that analysis for each ward and for each grade of staff could be carried out. It was emphasised to staff and students that only the researcher was aware of the code for each ward and individual. Staff were assured that all information given would remain anonymous and confidential to the researcher. Personal data (for example age, sex, marital status) was not collected as it was
An important ethical issue was the fact that I was known to be a nurse tutor in the school of nursing attached to the local hospital. Most of the potential local respondents in pre-registration training areas had a working relationship with me. Whilst this may have encouraged people to respond to the survey, it may also have limited the honesty of their replies. Respondents at hospital ‘B’, and most of those in the post-registration training areas in hospital ‘A’ were not known by me, and would only have been aware of my status by the return address on the envelope. Hence my role was less likely to affect the respondents from these latter areas. The replies from respondents in these areas therefore provided a method of monitoring the results from the various qualified staff groups.

5.8 Data analysis
Most of the data was analysed using a Statistical Package for Social Science (SPSS-Pc). The remainder was analysed using a Casio super-fx85v scientific calculator.

Factor analysis
Factor analysis was employed to analyse the scores from the qualified staff stressor questionnaire, and that from the student satisfaction questionnaire. The use of this approach provided a method by which variables that formed coherent subsets, relatively independent of each other, could be identified. The use of factor analysis thus provided the means by which construct validation could be assessed. Extraction of factors was achieved by identifying those factors which accounted for a
minimum of 6% of the variance, had Eigenvalues not less than 1.00, and were within the recommended parameters of the Scree-test. (The latter test involved examining the Eigenvalue graph, with the number of factors determined at a point where the Eigenvalues began to level off and form a straight line). The extracted factors were then subjected to quartimax or varimax rotation to obtain greater theoretical clarity.

In factor analysis each factor consists of one or more variables, which may be common to more than one factor. The greater the loading of a variable is towards a factor, the more likely the variable is to be considered a pure measure of that factor. Stevens (1986) deems 0.4 to be a significant loading, but Tabachnick and Fidell (1989) indicate that 0.45 is fair, 0.55 good, 0.63 very good, and 0.71 excellent. This study used a minimum loading of 0.5. In determining the reliability of the derived scales, items were assigned to the factor associated with the highest loading. Factor scores for each individual were calculated by multiplying the total factor loading with the raw score per factor. The resultant factor scores were used in subsequent analyses.

**Analysis of Emotional Response Measure (ERM).**

Each individual respondent was allowed to choose as many or few of the emotional words as they wished. Due to this, and the fact that there were varying number of respondents from each clinical area, analysis was undertaken by calculating the difference between the total number of positive and negative words chosen by each respondent. This was called the emotional balance score. The mean emotional balance score for each clinical area was then calculated.
5.9 Results

The results of phase 2 are presented in three parts.

1) qualified staff - perceived stress and emotional balance analysis

2) student nurses - perceived satisfaction with the clinical environment and emotional balance analysis

3) the comparison of findings from qualified staff and student respondents.

After presentation of the results the discussion addresses the findings of this phase of the study together with issues related to the measurement tools employed.
5.9/1 Analysis of stressor results from qualified staff. The response rate was 76% (N=105), with responses evenly distributed across the clinical areas in the survey. Calculation of the score for each stressor was based on a scoring system of 0 - 3, with 0 indicating no problem, and 3 indicating a major problem. The higher scores indicated that the trained staff perceived the working environment to be more stressful (see Table 5). The potential range of scores was 0 - 54.

<table>
<thead>
<tr>
<th>Clinical Unit</th>
<th>No of Areas in unit</th>
<th>Sample Size</th>
<th>Mean Raw Score</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical</td>
<td>4</td>
<td>25</td>
<td>21.03</td>
<td>9.56</td>
</tr>
<tr>
<td>Surgical</td>
<td>4</td>
<td>27</td>
<td>19.33</td>
<td>8.93</td>
</tr>
<tr>
<td>Elderly</td>
<td>3</td>
<td>14</td>
<td>19.50</td>
<td>7.25</td>
</tr>
<tr>
<td>Departmental</td>
<td>1</td>
<td>10</td>
<td>14.50</td>
<td>6.22</td>
</tr>
<tr>
<td>Specialist</td>
<td>5</td>
<td>29</td>
<td>17.17</td>
<td>8.48</td>
</tr>
</tbody>
</table>

Table 5 Mean Raw scores of qualified staff for each Clinical Unit

The data from the stressor questionnaire was subjected to Factor Analysis using a quartimax rotation. Four Factors were extracted (see Table 6). Each complied with the criterion of the study as indicated earlier in this chapter. Hence each had Eigenvalues greater than 1.00, all accounted for more than 6% of the variance, and all were contained within the parameters of the Scree test. (See Appendix 5 and 6 for full details of factor analysis).
Table 6 Rotated Factor Matrix for Qualified Staff Stressors
(Each factor is named according to the stressors it contains)
(Factor loading per variable is indicated, criteria of 0.5 used to determine which variable included within each Factor)
(see Appendix 7 for full wording of variables)

<table>
<thead>
<tr>
<th>Variables</th>
<th>Factor 1 (Interpersonal)</th>
<th>Factor 2 (Workload)</th>
<th>Factor 3 (Resources)</th>
<th>Factor 4 (Involvement)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lack of Feedback</td>
<td>.63626</td>
<td>.15459</td>
<td>.08408</td>
<td>.27202</td>
</tr>
<tr>
<td>Conflicting practices</td>
<td>.58676</td>
<td>.05035</td>
<td>-.04306</td>
<td>-.18076</td>
</tr>
<tr>
<td>Lack of Participation</td>
<td>.73878</td>
<td>.23248</td>
<td>.06901</td>
<td>-.13933</td>
</tr>
<tr>
<td>Lack of Support</td>
<td>.70669</td>
<td>.13926</td>
<td>.27868</td>
<td>.14803</td>
</tr>
<tr>
<td>Uncertain responsibility</td>
<td>.75760</td>
<td>-.12528</td>
<td>-.00423</td>
<td>-.08160</td>
</tr>
<tr>
<td>Lack of Appreciation</td>
<td>.68882</td>
<td>-.00752</td>
<td>-.05829</td>
<td>.38575</td>
</tr>
<tr>
<td>Relationships</td>
<td>.68882</td>
<td>-.28121</td>
<td>.20112</td>
<td>.23851</td>
</tr>
<tr>
<td>Workload fluctuations</td>
<td>-.03513</td>
<td>.61782</td>
<td>.40841</td>
<td>.11804</td>
</tr>
<tr>
<td>Time</td>
<td>.13655</td>
<td>.80920</td>
<td>.01521</td>
<td>-.00680</td>
</tr>
<tr>
<td>Amount of work</td>
<td>.06443</td>
<td>.85024</td>
<td>.13413</td>
<td>-.00119</td>
</tr>
<tr>
<td>Deadlines</td>
<td>.20560</td>
<td>.56023</td>
<td>.24099</td>
<td>.03234</td>
</tr>
<tr>
<td>Shortage of Resources</td>
<td>.22192</td>
<td>.12462</td>
<td>.77300</td>
<td>-.03260</td>
</tr>
<tr>
<td>Staff Shortages</td>
<td>.09922</td>
<td>.26594</td>
<td>.63960</td>
<td>.24148</td>
</tr>
<tr>
<td>Support staff</td>
<td>.48673</td>
<td>.01883</td>
<td>.53522</td>
<td>.00168</td>
</tr>
<tr>
<td>Physical environment</td>
<td>.24016</td>
<td>.04556</td>
<td>.51530</td>
<td>.08677</td>
</tr>
<tr>
<td>Emotional involvement</td>
<td>.29770</td>
<td>.16001</td>
<td>.07375</td>
<td>.62720</td>
</tr>
<tr>
<td>Working with Learners</td>
<td>.14026</td>
<td>-.07476</td>
<td>.17141</td>
<td>.77993</td>
</tr>
<tr>
<td>Eigenvalue</td>
<td>5.25368</td>
<td>2.42593</td>
<td>1.33617</td>
<td>1.26307</td>
</tr>
<tr>
<td>% of Variance</td>
<td>29.2</td>
<td>13.5</td>
<td>7.4</td>
<td>7.0</td>
</tr>
</tbody>
</table>

Factor 1 (interpersonal) accounted for 29.2% of the variance. It included seven stressors which could potentially make the nurse's job more difficult. All appeared to be linked to the interpersonal nature of the work of staff.

Factor 2 (workload) related entirely to areas of work which increased the perceived level of workload for the individual.
This included lack of time to do the amount of work which was expected, and the need to achieve deadlines. It accounted for 13.5% of the total variance.

Factor 3 (resources) encompassed aspects which related to the quality of the resources available - whether this was human, or physical working environment. It accounted for 7.4% of the variance.

Factor 4 (involvement) encompassed two areas of nursing care which potentially develop an emotional involvement - either with patients/relatives or with student nurses. This factor accounted for 7% of the total variance.

Factor scores were calculated for each respondent by multiplying the total factor loading with the raw score per factor. Mean factor scores for each clinical area are shown in Table 7. As previously indicated the questionnaire was only sent to full-time qualified staff, consequently the number of respondents within each clinical area were small. Generalizability of the findings from this phase of the study is therefore limited.

The actual range between the least perceived stressful working environment (area 18 - specialist) and the most stressfully perceived environment (area 6 - surgical) was a factor score of 11.41. The difference in total factor scores for these two areas was found to be significant in the amount of perceived stress created for the staff (U 1, N₁ 4, N₂ 7, p < 0.05).
<table>
<thead>
<tr>
<th>Clinical Area</th>
<th>N=</th>
<th>Interpersonal</th>
<th>Workload</th>
<th>Resources</th>
<th>Involvement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>8</td>
<td>3.88</td>
<td>4.24</td>
<td>4.12</td>
<td>0.74</td>
</tr>
<tr>
<td>5</td>
<td>5</td>
<td>3.89</td>
<td>6.46</td>
<td>5.44</td>
<td>0.81</td>
</tr>
<tr>
<td>17</td>
<td>4</td>
<td>3.48</td>
<td>5.80</td>
<td>4.86</td>
<td>0.86</td>
</tr>
<tr>
<td>20 $</td>
<td>8</td>
<td>4.90</td>
<td>3.33</td>
<td>2.69</td>
<td>1.02</td>
</tr>
<tr>
<td>Surgical</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>4</td>
<td>7.70</td>
<td>4.93</td>
<td>5.12</td>
<td>1.76</td>
</tr>
<tr>
<td>7</td>
<td>6</td>
<td>3.14</td>
<td>2.91</td>
<td>2.71</td>
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</tr>
<tr>
<td>16</td>
<td>7</td>
<td>3.49</td>
<td>4.15</td>
<td>2.31</td>
<td>0.39</td>
</tr>
<tr>
<td>21 $</td>
<td>10</td>
<td>3.18</td>
<td>5.16</td>
<td>3.80</td>
<td>0.95</td>
</tr>
<tr>
<td>Elderly</td>
<td></td>
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<td></td>
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<tr>
<td>10</td>
<td>4</td>
<td>2.71</td>
<td>5.72</td>
<td>3.46</td>
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</tr>
<tr>
<td>11</td>
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<td>6.60</td>
<td>2.61</td>
<td>0.46</td>
</tr>
<tr>
<td>12</td>
<td>7</td>
<td>5.13</td>
<td>4.89</td>
<td>3.52</td>
<td>0.57</td>
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</tr>
<tr>
<td>26</td>
<td>10</td>
<td>2.59</td>
<td>2.85</td>
<td>3.31</td>
<td>0.84</td>
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<tr>
<td>Specialist</td>
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<td></td>
</tr>
<tr>
<td>1</td>
<td>5</td>
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<td>5.25</td>
<td>4.12</td>
<td>0.44</td>
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<tr>
<td>23</td>
<td>5</td>
<td>2.86</td>
<td>4.81</td>
<td>3.63</td>
<td>0.87</td>
</tr>
<tr>
<td>22 *</td>
<td>3</td>
<td>5.88</td>
<td>1.67</td>
<td>3.93</td>
<td>0.86</td>
</tr>
<tr>
<td>18 *</td>
<td>7</td>
<td>2.31</td>
<td>3.67</td>
<td>2.06</td>
<td>0.06</td>
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<tr>
<td>19 *</td>
<td>9</td>
<td>3.59</td>
<td>4.09</td>
<td>1.92</td>
<td>0.75</td>
</tr>
<tr>
<td>Mean</td>
<td></td>
<td>3.75</td>
<td>4.50</td>
<td>3.50</td>
<td>0.71</td>
</tr>
</tbody>
</table>

Table 7 Mean Factor scores of Qualified Staff for each clinical area
(Factor score = total factor loading x raw scores per factor, therefore
the higher the score the greater the perceived stress)
($ = hospital 'B', * = post registration training area in hospital 'A')

The highest and lowest scoring areas for each factor were compared using Mann Whitney U-test. No significant difference was found between these areas in respect of the interpersonal, workload and involvement factors. However this finding may be due to the small sample size, or it could be due to the discriminatory power of the measurement tool. This issue is discussed later in this chapter.
Comparison of the highest scoring area for the resource factor (area 5 - medical) and the lowest scoring area (area 19 - specialist) indicated a significant difference in the perceived stress which the resource factor created for staff. (U 0.5, N₁ 5, N₂ 9, p < 0.05). This finding appears to suggest that staff shortages, poor quality of support staff, poor physical working conditions, and shortage of essential resources varies significantly from area to area.

Comparison of the total amount of perceived stress for staff working in post-registration training areas was slightly less than for those working in pre-registration training areas (see Table 8).

<table>
<thead>
<tr>
<th>Sample Size</th>
<th>Sample Size</th>
<th>Factor Score</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pre-registration training areas - Local Hospital</td>
<td>12</td>
<td>68</td>
<td>12.07</td>
</tr>
<tr>
<td>Pre-registration training areas - 'Other Hospital'</td>
<td>2</td>
<td>18</td>
<td>12.80</td>
</tr>
<tr>
<td>Post-registration training areas - Local Hospital</td>
<td>3</td>
<td>19</td>
<td>10.49</td>
</tr>
</tbody>
</table>

Table 8 Mean Factor Scores and Standard Deviations of Qualified staff working in Pre and Post Registration training areas.

When this result was compared with Table 7 no single factor appeared to be responsible for this slight reduction in overall perceived stress of staff working with post-registration students. Due to the unequal sample size analysis of variance (ANOVA) was not used.
Comparison of factor scores of qualified staff working with post-registration students (areas 18, 19 and 22 - specialist) and those working with pre-registration students (areas 1 and 23 - specialist) indicated there was no significant difference in the perceived stress of staff (U 80, N₁ 10, N₂ 19, n.s.). All five areas were a part of the same specialist clinical area, therefore the potential number of variables (such as managerial influences), which may have affected the result have been minimised. This finding therefore fails to support the prediction that qualified staff working in pre-registration training areas, would perceive more stress than those working in post-registration areas.

Factor scores of staff working with pre-registration students in the medical unit at hospital ‘A’ and ‘B’ were compared. No significant difference was identified. (U 48.5, N₁ 8, N₂ 17, n.s.). Similarly no significant difference was found between the factor scores of staff working with pre-registration students in the surgical unit at hospital ‘A’ and ‘B’. (U 72.5, N₁ 10, N₂ 17, n.s.). Although sample sizes are small, these two findings would appear to support the prediction that perceived stress of qualified staff in pre-registration training areas is similar between the two hospitals in the study.

5.9/2 Analysis of emotional response results from qualified staff.

There was a 75% response rate (N = 105). Although the results indicated that about half of all qualified staff were happy (52.38%), felt appreciated (48.57%), and confident (49.52%), the negativity from staff was more apparent with feelings of frustration (61.90%), weariness (57.14%), irritation (48.57%),
and exhaustion (46.66%) expressed. The remaining positive and negative words were chosen by less than 40% of all the respondents.

Words which more than 50% of the staff of an area had chosen were compared with the stress factor score (see Table 9).

<table>
<thead>
<tr>
<th>Clinical Area</th>
<th>N=</th>
<th>Positive Words</th>
<th>Stress Factor score</th>
<th>Negative Words</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>H  A  C  St  Al  Ab</td>
<td></td>
<td>F  W  Ex  I</td>
</tr>
<tr>
<td>18</td>
<td>7</td>
<td>*   *   *   *   *</td>
<td>8.10</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>7</td>
<td>6</td>
<td>*   *   *   *   *</td>
<td>8.76</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>26</td>
<td>10</td>
<td>*   *   *   *   *</td>
<td>9.59</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>16</td>
<td>7</td>
<td>*   *   *   *   *</td>
<td>10.34</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>19</td>
<td>9</td>
<td>*   *   *   *   *</td>
<td>10.35</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>11</td>
<td>3</td>
<td>*   *   *   *   *</td>
<td>11.68</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>20</td>
<td>8</td>
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<td>11.94</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>23</td>
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<td>3</td>
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<td>12.98</td>
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</tr>
<tr>
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<td>10</td>
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<td>13.09</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>12</td>
<td>7</td>
<td>*   *   *   *   *</td>
<td>14.11</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>17</td>
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<td>*   *   *   *   *</td>
<td>15.00</td>
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</tr>
<tr>
<td>5</td>
<td>5</td>
<td>*   *   *   *   *</td>
<td>16.60</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>6</td>
<td>4</td>
<td>*   *   *   *   *</td>
<td>19.51</td>
<td>*   *   *   *</td>
</tr>
<tr>
<td>Total</td>
<td>10</td>
<td>8   7   5   4   4</td>
<td>11 9 8 6</td>
<td></td>
</tr>
</tbody>
</table>

Table 9 Factor Scores and Emotional Words chosen by more than 50% of Qualified Staff working in same clinical area
(Key - H = Happy, A = Appreciated, C = Confident, St = Stimulated, Al = Alert, Ab = absorbed, F = Frustrated, W = Weary, Ex = Exhausted, I = Irritated)
(Abridged to include words used by four or more areas)

There appeared to be no relationship between the perceived stress factor scores of the respondents and the use of specific
It was decided that greater sensitivity of the results would be achieved by calculating the emotional balance scores of each individual. This was carried out by subtracting the total number of negative words each person had chosen from the total number of positive words they used.

<table>
<thead>
<tr>
<th>Clinical area</th>
<th>N</th>
<th>Mean Emotional Balance Score per area</th>
<th>Mean Stressor Factor Score per area</th>
</tr>
</thead>
<tbody>
<tr>
<td>18</td>
<td>7</td>
<td>0.14</td>
<td>8.10</td>
</tr>
<tr>
<td>7</td>
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<tr>
<td>11</td>
<td>3</td>
<td>3.33</td>
<td>11.68</td>
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<td>8</td>
<td>-0.37</td>
<td>11.94</td>
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<td>12.97</td>
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<td>12.98</td>
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<td>13.09</td>
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<td>-1.00</td>
<td>14.11</td>
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<td>5</td>
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<td>16.60</td>
</tr>
<tr>
<td>6</td>
<td>4</td>
<td>-9.00</td>
<td>19.51</td>
</tr>
</tbody>
</table>

Table 10 Mean Emotional Balance Scores and Mean Stressor Factor Scores of qualified staff per Clinical Area
(Minus sign indicates clinical area is viewed negatively)
(N = number of respondents per clinical area)
The mean emotional balance score for each clinical area was then calculated and compared with the mean factor score per area (see Table 10). Most staff viewed the working environment positively. Only one area was viewed very negatively.

The relationship between the mean stressor factor score and the mean emotional balance per clinical area was found to be strong and significant ($r = -0.684$, $N = 17$, $p < 0.005$, 1 tailed). This relationship was further analysed using the factor stressor scores and emotional balance scores of individuals (as opposed to mean scores per clinical area). The relationship was also found to be moderately strong ($r = -0.555$, $N = 105$, $p < 0.005$, 1 tailed). These results suggest that the greater the perceived stress of the trained staff the more negative is their emotional balance.

5.9/3 Summary of findings from qualified staff
There are several interesting points which have been raised by the findings related to qualified staff. Factor analysis clearly identified four factors which potentially act as stressors for qualified staff. Of these two - interpersonal and involvement were related to relationships within the job. The other two factors - workload and resources were related to organisational aspects of work. Only the total factor score and the resources factor score showed a statistical difference between high and low scoring areas. There was a moderately strong relationship between the perceived stress of individuals and their emotional balance state. Further discussion of these issues is undertaken later in this chapter.
5.9/4 Analysis of results from student clinical learning satisfaction scale.

A total of 162 replies were received from students in respect of the learning environment this representing a 100% response rate. Calculation of the score for the semantic differential scale was based on a scoring system of 1 to 7 for each semantic differential scale (with 1 indicating the negative end of the scale, and 7 the positive end of the scale). The potential range of scores was from 17 to 119. The higher scores indicate that the student viewed the clinical learning area more positively (see Table 11).

<table>
<thead>
<tr>
<th>Clinical Unit</th>
<th>No of Areas per unit</th>
<th>Sample size</th>
<th>Mean Raw Score</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical</td>
<td>3</td>
<td>28</td>
<td>96.642</td>
<td>17.74</td>
</tr>
<tr>
<td>Surgical</td>
<td>3</td>
<td>23</td>
<td>78.04</td>
<td>18.80</td>
</tr>
<tr>
<td>Elderly</td>
<td>3</td>
<td>15</td>
<td>90.06</td>
<td>14.68</td>
</tr>
<tr>
<td>Department</td>
<td>2</td>
<td>38</td>
<td>94.238</td>
<td>20.25</td>
</tr>
<tr>
<td>Specialist</td>
<td>2</td>
<td>58</td>
<td>74.68</td>
<td>18.02</td>
</tr>
</tbody>
</table>

Table 11 Mean Raw Scores of Student Nurses for each Clinical Unit.
(Potential score range = 17 - 119)
(N = number of clinical areas per Unit)

The data from the learning satisfaction questionnaire was subjected to Factor Analysis. Two Factors were extracted (see Table 12). Each accounted for a minimum of 6% of the variance, had Eigenvalues greater than 1.00 and complied with the Scree Test. (Full details are in Appendix 8 and 9)
<table>
<thead>
<tr>
<th>Factor</th>
<th>1 Interpersonal</th>
<th>2 Organizational</th>
</tr>
</thead>
<tbody>
<tr>
<td>Learners Valued</td>
<td>.70485</td>
<td>.45767</td>
</tr>
<tr>
<td>Enjoyable environment</td>
<td>.74624</td>
<td>.22286</td>
</tr>
<tr>
<td>Relaxed atmosphere</td>
<td>.74215</td>
<td>.13183</td>
</tr>
<tr>
<td>Flexible approach</td>
<td>.81380</td>
<td>.12992</td>
</tr>
<tr>
<td>Learners Nurtured</td>
<td>.68238</td>
<td>.53425</td>
</tr>
<tr>
<td>Caring</td>
<td>.53953</td>
<td>.40855</td>
</tr>
<tr>
<td>Friendly</td>
<td>.66515</td>
<td>.30243</td>
</tr>
<tr>
<td>Staff Approachable</td>
<td>.55888</td>
<td>.49285</td>
</tr>
<tr>
<td>Praised v Criticised</td>
<td>.76262</td>
<td>.28708</td>
</tr>
<tr>
<td>Learners Considered</td>
<td>.64183</td>
<td>.52171</td>
</tr>
<tr>
<td>Teaching Planned</td>
<td>.31011</td>
<td>.70823</td>
</tr>
<tr>
<td>Stimulating</td>
<td>.54709</td>
<td>.60919</td>
</tr>
<tr>
<td>Leadership Strong</td>
<td>.07404</td>
<td>.79700</td>
</tr>
<tr>
<td>Helped</td>
<td>.47448</td>
<td>.64703</td>
</tr>
<tr>
<td>Motivating</td>
<td>.47736</td>
<td>.69271</td>
</tr>
<tr>
<td>Good Teamwork</td>
<td>.47462</td>
<td>.59319</td>
</tr>
<tr>
<td>Teaching Relevant</td>
<td>.13848</td>
<td>.80622</td>
</tr>
</tbody>
</table>

Table 12 - Rotated Factor Matrix for Students Clinical Learning Satisfaction aspects
(Note - Praised v Criticised - full wording is Praised more than Criticised)

Factor 1 (interpersonal) accounted for a major part of the variance (54.9%). All the aspects encompassed within this factor related to the interpersonal nature of the work, which helped to create a good working atmosphere/climate.

Factor 2 (organizational) encompassed areas which facilitated the development of a good learning environment for the student. All these variables related to organizational aspects. The degree of shared common variance suggests that these factors are interrelated.
The these two factors were computed for each clinical area (see Table 13).

<table>
<thead>
<tr>
<th>Clinical Area</th>
<th>N=</th>
<th>Interpersonal Factor score</th>
<th>Organizational Factor score</th>
<th>Total Factor Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical</td>
<td></td>
<td>29.12</td>
<td>64.17</td>
<td>93.29</td>
</tr>
<tr>
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<tr>
<td></td>
<td></td>
<td>21.03</td>
<td>59.15</td>
<td>80.18</td>
</tr>
<tr>
<td></td>
<td></td>
<td>19.61</td>
<td>53.70</td>
<td>73.31</td>
</tr>
<tr>
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<td></td>
<td>26.46</td>
<td>64.17</td>
<td>90.63</td>
</tr>
<tr>
<td></td>
<td></td>
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<td>56.45</td>
<td>77.38</td>
</tr>
<tr>
<td></td>
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<tr>
<td></td>
<td></td>
<td>27.85</td>
<td>67.43</td>
<td>95.28</td>
</tr>
<tr>
<td></td>
<td></td>
<td>23.03</td>
<td>57.46</td>
<td>80.49</td>
</tr>
<tr>
<td></td>
<td></td>
<td>23.19</td>
<td>51.44</td>
<td>74.63</td>
</tr>
<tr>
<td></td>
<td></td>
<td>22.45</td>
<td>51.29</td>
<td>73.74</td>
</tr>
<tr>
<td>Surgical</td>
<td></td>
<td>32.29</td>
<td>19.27</td>
<td>51.56</td>
</tr>
<tr>
<td></td>
<td></td>
<td>38.12</td>
<td>21.03</td>
<td>59.15</td>
</tr>
<tr>
<td></td>
<td></td>
<td>34.09</td>
<td>19.61</td>
<td>53.70</td>
</tr>
<tr>
<td>Elderly</td>
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<td>37.71</td>
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<td>64.17</td>
</tr>
<tr>
<td></td>
<td></td>
<td>35.52</td>
<td>20.93</td>
<td>56.45</td>
</tr>
<tr>
<td>Department</td>
<td></td>
<td>39.77</td>
<td>24.96</td>
<td>64.73</td>
</tr>
<tr>
<td>Specialist</td>
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<td>27.85</td>
<td>67.43</td>
</tr>
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<td></td>
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<td>23.03</td>
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<td>Mean factor score</td>
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<td>59.84</td>
<td></td>
</tr>
</tbody>
</table>

Table 13 Mean Satisfaction Factor scores of Student nurses for each Clinical Area. Maximum factor score for Factor 1 = 48.002, and Factor 2 = 33.97

It was found that the Specialist Unit was scored the most negatively by the students (see Table 13). The main contributor for this negativity appeared to be the low interpersonal factor score from both the specialist clinical areas.

The actual range of factor scores between the most satisfactory learning area (area 2 - medical) and the least (area 23 - specialist) was a difference of 19.26. The difference in total factor scores for these two areas was found to be significant (U 9, N1 7, N2 29, p < 0.05).
The difference between the area perceived as most satisfactory for the interpersonal factor (area 2 - medical) and least satisfactory (area 1 - specialist) was found to be significant (U 5, N₁ 7, N₂ 29, p < 0.05). Due to the unequal sample sizes ANOVA was not used.

The difference in the areas perceived as most satisfactory for the organizational factor (area 2 - medical) and the least satisfactory (area 6 - surgical) was not found to be significant. (U 18, N₁ 7, N₂ 10, n.s.).

In all of the above findings the sample sizes are small and thus the significance of the results may have been affected by this issue. Findings appear to suggest that student satisfaction with the clinical learning environment is not related to the type of nursing involved.

5.9/5 Analysis of emotional response results from students
All of the 162 replies were correctly completed and the analysis of all variables reflects a full response. The majority of students indicated that they felt appreciated (66.05%), happy (53.09%), confident (54.32%) and encouraged (51.23%). Feelings of being exhausted and weary were indicated by 50% and 42.59% of the students respectively. The remaining positive and negative emotional words were used by less than 40% of respondents. There was little evidence of any relationship between the use of particular emotional words and the satisfaction score using a visual representation (see Table 14). Most students tended to view the clinical learning environment positively. However, students working in clinical learning areas which were perceived to be negative, were inclined to use more negative words than positive ones.
Table 14 Factor Scores, and Emotional Words chosen by more than 50% of the students in same clinical area

(Abridged version - only includes words used by four wards or more)

(Key = A = Appreciated, H = Happy, C= Confident, En = Encouraged,
St = Stimulated, S = Satisfied, Ef = Efficient, V = Valued, W = Weary
Ex = Exhausted, F = Frustrated.)

<table>
<thead>
<tr>
<th>Ward</th>
<th>A</th>
<th>H</th>
<th>C</th>
<th>En</th>
<th>St</th>
<th>S</th>
<th>Ef</th>
<th>V</th>
<th>Factor Score</th>
<th>W</th>
<th>Ex</th>
<th>F</th>
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<td>*</td>
<td>*</td>
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<td>*</td>
<td>*</td>
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<td></td>
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</tr>
<tr>
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<td>*</td>
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<td></td>
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<td>4</td>
<td>119 96 44 44 4</td>
<td>4</td>
<td>4</td>
<td>4</td>
</tr>
</tbody>
</table>

An emotional balance score per person was calculated by subtracting the total number of negative words they had chosen from the total number of positive words they used. The total satisfaction factor score per person and their emotional balance score were found to be strongly associated (r 0.769, n 162, p < 0.005, 1 tailed). This result suggests that as perceived satisfaction with the clinical learning area increases, students feel more emotionally positive.

A similar approach was used to ascertain whether there was also a relationship between the mean emotional balance score and the mean total factor score for each clinical area (see Table 15). The relationship between these two scores was found to be strong (r 0.819, n 13, p<0.005,1 tailed)
<table>
<thead>
<tr>
<th>Area</th>
<th>N=</th>
<th>Emotional Balance Score</th>
<th>Total Satisfaction Score</th>
</tr>
</thead>
<tbody>
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<td>2</td>
<td>7</td>
<td>4.43</td>
<td>70.55</td>
</tr>
<tr>
<td>26</td>
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<td>67.43</td>
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<td>65.80</td>
</tr>
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<td>12</td>
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<td>4.25</td>
<td>64.73</td>
</tr>
<tr>
<td>5</td>
<td>10</td>
<td>5.00</td>
<td>64.19</td>
</tr>
<tr>
<td>10</td>
<td>6</td>
<td>3.00</td>
<td>64.17</td>
</tr>
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<td>6</td>
<td>3.83</td>
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<tr>
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<td>29</td>
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<td>51.44</td>
</tr>
<tr>
<td>23</td>
<td>29</td>
<td>-1.34</td>
<td>51.29</td>
</tr>
</tbody>
</table>

Table 15 Students Mean Emotional Balance and Satisfaction Scores per clinical learning area

5.9/6 Summary of findings from student nurses.
Factor analysis clearly identified two factors - interpersonal and organisational. The total satisfaction score and the interpersonal factor score showed a significant difference between the highest and lowest scoring areas. There was a strong relationship between the perceived satisfaction of students and their emotional balance state.

5.9/7 Comparison of results from qualified staff and pre-registration student nurses.
There was a total of 11 clinical areas from which both trained staff and students had responded, which gave a total of 61 qualified staff and 146 student respondents. The stressor scores of qualified staff and the satisfaction scores of students were ranked separately from 1 to 11 (see Figure 16).
The rank of 1 was used to represent clinical environments which trained staff perceived as low stress areas and students perceived as good learning areas.

The rank of 11 represented those areas where qualified staff perceived high stress levels, and students considered them as the least satisfactory learning areas.

No relationship was found between the two groups in their ranked scores ($r_s = 0.109$, $n = 11$, n.s). It is however noted that students tended to rank areas using primary nursing care approaches higher (i.e., providing more satisfaction) than those using task/team methods (see Table 16). Conversely there

<table>
<thead>
<tr>
<th>STUDENT Satisf</th>
<th>Clinical</th>
<th>QUALIFIED STAFF Stressor</th>
</tr>
</thead>
<tbody>
<tr>
<td>Score</td>
<td>Rank</td>
<td>Area</td>
</tr>
<tr>
<td>70.55</td>
<td>1</td>
<td>2 P</td>
</tr>
<tr>
<td>67.43</td>
<td>2</td>
<td>26 P</td>
</tr>
<tr>
<td>65.80</td>
<td>3</td>
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<td>1 T</td>
</tr>
<tr>
<td>51.29</td>
<td>11</td>
<td>23 T</td>
</tr>
</tbody>
</table>

Table 16: Rank of clinical areas and related satisfaction/stress scores for Students and Qualified Staff

Note - Low Qualified staff scores = areas where least stress perceived
High Student scores = areas where greatest satisfaction experienced
P = clinical areas where staff indicated primary nursing care used
T = clinical areas where staff indicated task/team nursing used
was a tendency for qualified staff to rank areas using task/team methods higher (ie less stressful) than those where primary nursing care approaches were used.

Factor analysis of the data from qualified staff and students indicated that both these groups of respondents had an interpersonal factor. The results from both groups were ranked (see Table 17), but again no relationship was found between the ranking of the two groups of respondents in respect of this factor. \( r_s = 0.209, n = 11,\ ns \).

<table>
<thead>
<tr>
<th>STUDENT Interpersonal score</th>
<th>RANK</th>
<th>CLINICAL AREA</th>
<th>RANK</th>
<th>QUALIFIED STAFF Interpersonal score</th>
</tr>
</thead>
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<tr>
<td>41.43</td>
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<td>11</td>
<td>1</td>
<td>6</td>
<td>3.16</td>
</tr>
</tbody>
</table>

Table 17  Rank of clinical areas and associated interpersonal factor scores of qualified staff and student nurses
(The higher the student score the greater their perceived satisfaction)
(The higher the qualified staff score the greater their perceived stress)

As the emotional balance measure provided a common point of reference for both qualified staff and students the emotional balance scores from both groups of respondents were analysed. Although there appeared to be a moderate relationship between the mean emotional responses of qualified staff and students.
within the same clinical areas it did not reach statistical significance. (r 0.4937, n 11, ns).

5.10 Summary of Phase 2 findings
The main findings of Phase 2 indicate that:-

- work stressors for qualified staff consisted of factors associated with interpersonal aspects, workload, resources and tasks which required emotional involvement.
- satisfaction of students consisted of factors associated with interpersonal and organizational issues from within the clinical learning environment
- no significant difference was found between the perceived stress of qualified staff working with pre-registration students and those working with post-registration students
- no significant difference was found in the perceived stress of qualified staff working in pre-registration training areas in the two hospitals in the survey
- student satisfaction with the clinical learning environment did not appear to be related to the type of clinical work involved.
- there appeared to be a tendency for students to perceive primary nursing care areas as more satisfying learning environments than those where team/task-based approaches to patient care were employed
- no relationship was found between the perceived stress of staff and student satisfaction with the clinical learning environment.
- there appeared to be a moderate, but non-significant relationship between the emotional balance of qualified staff and students working in the same clinical learning environment.
5.11 Discussion

At the commencement of this study in 1989 it was hypothesised that there would be a relationship between the perceived stress of qualified staff and the satisfaction of student nurses within the clinical learning environment. As there appeared, at that time, to be a limited range of measuring tools appropriate for the aims of the study, the first phase of the study was used to design, develop and test tools. The second phase of the study consisted of a survey approach to test these tools across a larger sample group of respondents working in a wider range of clinical areas. The extremely good response rate from both qualified staff and student nurses during the second phase of the study was attributed to the fact that representatives from both these groups had been involved in the design of the tools. Although the content and format of the tools was therefore relevant to their needs, the results from the survey appeared to provide little support for the hypothesis. Whilst the initial response was to assume that there was no relationship between the stress of qualified staff and the satisfaction of students in the clinical learning environment it was also considered that the apparent lack of any such relationship could have been affected by a number of issues. In particular the sample sizes from the various clinical areas may have been too small for any relationship to be identified. Secondly, if there was a relationship, it was both complex and involved additional intervening variables, neither of which had been identified by the survey approach as used. The third possible explanation was that there was a relationship between the variables but the measuring tools lacked discriminatory power. Finally a combination of aspects from any of the afore-mentioned reasons could also have resulted in failure to identify any relationships which may have existed between the perceived stress of qualified staff and the satisfaction of students in the clinical learning environment.
As the measuring tools were a crucial element in this phase of the study the first part of the discussion is, in the light of the results obtained from phase 2, devoted to further examination of the validity and reliability of these tools. Following this the discussion focuses on the commonalities and differences identified between the two groups of respondents and finally intervening variables which may have influenced the outcomes of the study are briefly examined.

Staff stressor tool.
The content validity and internal reliability of this tool, which were considered in phase 1, provided good evidence in favour of using this measure. During the second phase of the study data, from a larger sample group and across a wider range of clinical nursing areas, was collected and subjected to factor analysis. The latter, according to Polit and Hungler (1989), is an appropriate method in the assessment of construct validity. Although a minimum factor loading of 0.5 was accepted for inclusion of a variable within a designated factor, 76% of variables had a factor loading greater than 0.6. Based on work by Tabachnick and Fidell (1989) the majority of these loadings are therefore good to excellent. Four factors were identified which accounted for 57 per cent of the total variance. These factors, which suggested that interpersonal issues, workload, resources, and involvement were important aspects for qualified nursing staff, appeared to be well supported by published literature (Gray-Toft and Anderson 1981; Foxall et al 1990; Gilloran et al 1994; Hart and Rotem 1995; Yamashita 1995) and by my own personal experience. It therefore appeared that construct validity of the staff stressor scale was acceptable.
A large percent of the variance was attributed to the interpersonal factor (29%) but this may have been due to the fact that it is an artefact of factor analysis that much of the variance credited to each factor is often heavily weighted onto the first extracted factor. Although the extracted factors were orthogonal, there was inevitably a degree of shared variance between them which was loaded in favour of the first factor to emerge - in this case the interpersonal factor. Equally, the high percentage of variance attributable to this factor was not surprising as many aspects of work are potentially influenced by interpersonal issues. Caution should however be exercised when interpreting the importance of each factor on the basis of explained variance.

The purpose of this phase of the study was to assess the relationship between qualified staff stress and student satisfaction within individual clinical areas, therefore it was deemed important to ascertain whether the identified factors were able to discriminate between the levels of stress in the different clinical areas. Whilst scores across all four factors combined discriminated between high and low scoring clinical areas, only one individual factor - resources - was identified which discriminated between high and low scoring areas. This finding suggested that staff shortages, poor quality of support staff, poor physical working conditions and shortage of essentials resources were perceived to be statistically dissimilar by qualified staff working in different clinical areas.

As indicated above much of the common variance was weighted in favour of interpersonal aspects of work, therefore it was even more significant that the resource factor showed some discriminating power. Whilst the resource factor was the most amenable to objective reporting, the other factors - interpersonal, workload, and
involvement - were less concrete and therefore more likely to have been influenced by variations in subjective perceptions. Although scores on the interpersonal and workload factors appeared to demonstrate a similar range to those of the resources factor those on the involvement factor showed a much smaller range of factor scores. This was attributed to the fact that there were only two questions encompassed within this factor.

It was indicated above that scores across all four factors discriminated between high and low scoring clinical areas, but these areas were not those which were actually scored highest and lowest on the resources factor. Although no statistical significance was found for three of the four factors, findings indicated that high scoring stress areas had a tendency for a high level of stress in all four factors, whilst conversely low scoring stress areas tended to be scored low across all factors.

It is however important to note that the levels of discrimination were often obtained on the basis of a limited number of qualified staff in the specified clinical areas. In fact there were only 5 members of staff on the specified medical area where resources caused high stress, and 9 on the specialist surgical area where resources were perceived as a low stressor. Even when there is a high response rate the small numbers of permanent qualified nursing staff working in each clinical area is always likely to prove problematic in terms of statistical discrimination. Although the failure to obtain statistical differences for three of the factors - interpersonal, workload and involvement - may be attributed to the small sample size so too could it, at this stage of the study, be credited to the poor discriminatory power of the measurement instrument. Further testing of the tool therefore needs to be carried out with a larger sample group across a wider range of
nursing contexts in order to ascertain the discriminatory power and thus the predictive validity of the measuring scale.

In order to test the generalisability of the stressor tool the survey also included qualified staff working in post-registration training areas in the main hospital in the study, as well as those working in pre-registration medical and surgical areas in another hospital within the same regional health authority. No statistical difference was found between the stress levels of those working in surgical and medical clinical learning areas in both the hospitals, nor between the perceived stress of those working with post-registration students and pre-registration students. These findings may however have been influenced by the fact that stressors used in the stressor tool were only derived from, and piloted among, qualified staff working in pre-registration areas in the local hospital. Consequently staff working in post-registration areas and those in the other hospital in the region may not have had stressors included which were pertinent to their working area.

Although the lack of statistical difference between pre-registration training areas, and between post and pre registration training areas enhances the generalisability of the findings, caution should be exercised if these findings are applied to other areas of nursing care, or to similar areas of nursing care in other parts of the country. The findings principally relate to a middle class group of respondents as found in the south of England, therefore findings are only generalisable within a similar sample group.

Overall it is considered that the stressor scale for qualified staff has not only produced distinctive and easily identifiable factors, but so too has it found to be sufficiently sensitive to detect important but subtle differences between various clinical areas,
albeit there were small numbers of respondents in each area. Based on this finding it is argued that the use of this instrument has not unduly exposed the findings to type 2 errors - failure to obtain a significant result where there should be one. The findings related to qualified staff, similar to those made by Dolan (1987) and Power and Sharp (1988), suggested that perceived stress not only differed between clinical areas and between different types of work environments, but so too, as found by Foxall et al (1990), could it be derived from different sources. The underlying reasons why qualified staff in some clinical areas perceived more stress than their colleagues in other areas was not identified but it would appear to be an important issue which requires further in-depth investigation.

Whilst the stressor scale appeared to have both content and construct validity issues relating to predictive validity were not addressed during this phase of the study. As indicated earlier it is therefore recommended that further testing of this tool should be undertaken across a larger sample group of respondents, working in various clinical learning areas, in order to fully assess its validity and reliability.

*Student satisfaction measure*
Issues related to content validity and internal reliability were considered and found to be satisfactory in phase one, but additional support for the reliability and construct validity was provided by the factor analysis used during the second phase of the study. Although a factor loading of 0.5 was the accepted minimum for inclusion of a variable within a factor 82% of the variables had a factor loading greater than 0.6 which represented a good to excellent result. Two factors were identified -
interpersonal and organisational - which together accounted for 63 per cent of the variance. Again it was found that there was a lot of common variance between the factors, a fact confirmed by the high proportion of variance accounted for by the first extracted factor (interpersonal). Although caution is advisable when interpreting the importance of each factor on the basis of explained variance the high percentage level attributed to the interpersonal factor was not surprising as various studies (for example Hyland et al 1988; Lindop 1989; Lewis and Deans 1991) have also identified the importance of interpersonal aspects in the creation of a good learning environment for student nurses. As the overall importance of both the extracted factors was also well supported by other published literature (Fretwell 1982; Jackson and Neighbors 1988; Smith 1988), and by personal observations, it appeared that construct validity of the clinical learning satisfaction scale was acceptable.

Since the purpose of this study was to assess the relationship between student satisfaction and qualified staff stress within the clinical learning environment it was again considered important to ascertain whether the two identified factors were able to discriminate between the levels of satisfaction perceived by student nurses in the different clinical areas. Whilst scores across both factors discriminated between high and low scoring clinical areas, only one individual factor - interpersonal - was identified which discriminated between high and low scoring areas. It was also found that the area which scored highest across both factors also scored the highest on both the interpersonal and organisational factors. However the converse was not found in that the area which scored lowest across both factors was not the lowest scoring area for either the interpersonal or the organisational factors. Although levels of perceived satisfaction
relating to organisational issues were not found to be statistically different between the various clinical areas, the overall findings suggested that the clinical learning educational satisfaction scale had good discriminative power. Similar to the findings from qualified staff perceived satisfaction for students appeared to not only differ between clinical areas, regardless of type of nursing involved, but so too did it appear to be derived from different sources. Again the underlying reasons as to why some areas created more satisfaction for students than other areas were not detected by the survey approach as used. As clinical experience forms an important part of the course for student nurses, the reasons why students gained more satisfaction in some areas than in others would appear to be an important issue which warrants further investigation.

Whilst the clinical learning environment satisfaction scale appeared to have both content and construct validity issues related to predictive validity were again not addressed. It is therefore recommended that further testing of this tool should be undertaken across a larger sample group of respondents, working in various clinical learning areas, in order to fully assess the validity and reliability of this scale.

Emotional Response Measure
This was an important measure as it was completed by both qualified staff and students, and therefore provided a common point of reference and comparison for the respondents from both groups. Qualitative information, about the feelings encountered in different clinical areas, was provided by the use of common words supplied by representatives from the two sample groups. The instrument measured the use of a range of positive and negative emotionally charged words by their presence or absence rather
than by degree. Scoring of this measure was achieved by subtracting the number of positive words used from the number of negative words. This was referred to as the emotional balance score. Although there were more negative words listed (N=29) than positive words (N=23), the majority of scores for both groups of respondents were positive. Only one clinical area emerged as very negative for the qualified nursing staff, and this also scored high on all factors of the qualified staff stressor scale. A strong statistical significance was identified between the relationship of the factor stressor score and the emotional balance score. Similarly there was a strong positive relationship between the satisfaction scores of students and their emotional response score. However when the emotional balance scores of qualified staff and students working in the same area were compared a moderate but non-significant relationship was identified. It was not clear if this was due to a lack of reliability and validity of the instrument or a lack of any relationship between the variables included in the measuring tool. Two alternative possibilities may have accounted for the latter.

Firstly the data was collected from students from all three years of the course, yet it was this aspect which may have affected the detection of any relationship between the stress of qualified staff and the satisfaction of students. Based on findings by Lewis and Deans (1991) that socialisation of students into the nursing profession occurs throughout their course, it is feasible that many of the students, particularly those in the first or second year of the course, may not have been fully socialised into the nursing profession when they completed the survey. Added to this Hobfoll (1988) suggested that emotions are, in part, socially constructed thus the way students experienced, labelled or managed their
emotions may not have been the same as that used by qualified staff.

The second explanation, which involves a more detailed analysis of the emotional status underlying the words in the emotional response measure, would suggest that some of the listed emotions are related to satisfaction/dissatisfaction and others to stress (for example anxiety, anger, fear and depression). Although the latter emotions may result from cognitive appraisal of a situation they are also closely associated with alteration in the physiological state plus innate behavioural responses of the individual. On the other hand emotions related to satisfaction and dissatisfaction are also associated with cognitive appraisal of a situational event but they do not necessarily involve physiological changes. Furthermore, whilst the perception of stress leads to dissatisfaction, dissatisfaction does not necessarily lead to the perception of stress.

It was therefore apparent that the emotional response measure not only contained different dimensions of emotions which were not closely associated, but so too did it contain socially constructed emotions which were not appropriate for both sample groups. It was considered that either of these issues could have accounted for the moderate but non-significant relationship between the perceived emotional balance scores of qualified staff and students nurses. Due to these afore mentioned aspects it was therefore considered that the emotional response measure did not fulfil the objectives for which it was devised, and thus it is not recommended for future use.

It is however considered that the staff stressor scale and the clinical learning environment satisfaction scale have been shown
to be reliable, have content and construct validity, and be sufficiently sensitive to detect important but subtle differences between various clinical learning environments. Although individually these tools provided a satisfactory method of measuring the stress in qualified staff or the satisfaction of students in the clinical learning environment the original hypothesis - that there would be a relationship between the stress perceived by qualified nursing staff and the satisfaction students experienced with the clinical learning environment - was not supported. As indicated earlier it is important to note that issues related to predictive validity were not addressed therefore it is recommended that further testing of these tools, across a wider range of clinical areas and a larger sample of respondents, should be carried out before these scales are adopted for future use.

Findings from this survey phase do however suggest that there are a number of commonalities and differences between the sources of stress perceived by qualified staff and the satisfaction perceived by student nurses. The extent to which these may have affected any relationships between qualified staff stress and student satisfaction is examined in the next part of the discussion.

Commonalities and differences in the variables associated with staff stress and student satisfaction
Overall two factors emerged - interpersonal issues and organisational aspects - which were common to both qualified staff and student nurses. Whilst the importance of interpersonal relationships within the working environment have been identified in various studies (for example Hinshaw et al 1987; Hisashige et al 1989) present findings suggest that qualified staff and students variables within interpersonal factor originated from different
All the variables contained within the student interpersonal factor related to aspects within the clinical learning environment which reflected an interaction between qualified staff and students (for example learners nurtured, flexible approach, staff approachable etc). These findings are not only commensurate with studies mentioned earlier in this section (Hyland et al 1988; Lindop 1989; Lewis and Deans 1991), but so too are they similar to those made by Firth et al (1986) who found that satisfaction for students was directly related to the ability of the qualified nurse to listen, encourage and communicate their appreciation to the student. Present findings related to student satisfaction would therefore, in part, appear to support the work of Tough (1979) and Smith (1988) that the ideal helper is warm, supportive, encouraging, friendly and approachable.

The variables included within the qualified staff interpersonal factor were, however, found to originate from two different sources. Firstly were those which were due to lack of involvement and support by caring team colleagues (for example lack of appreciation by other staff, lack of support from senior staff, lack of participation in planning/decision making). Secondly were those which related to other relationships and included two aspects - emotional involvement at work and working with learner nurses. Various published studies have also found many of the aspects identified in the present findings - for example lack of empathetic support from managers (MacLellan 1990), the need for peer support, autonomy and recognition (Hart and Rotem 1995), lack of participation in decision making (Tsai 1993), lack of social integration (McCloskey 1990) and emotional involvement at work (Foxall et al 1990). Whilst findings from these studies enhance the reliability and validity of the present findings so too do they highlight the fact that variables within the qualified staff
interpersonal factor originate from a variety of aspects within the clinical learning environment.

Overall the findings related to the interpersonal factor would appear to indicate that students look to qualified staff for support when working in the clinical learning area, whilst qualified staff in the clinical area seek support from their colleagues and supervisors. It would therefore appear that the lack of any identified relationship between the interpersonal factor for qualified staff and students may be attributed wholly, or at least in part, to the fact that a number of variables within this factor originate from different sources for the two groups of respondents in the present study.

Apart from the fact that both groups of respondents had an interpersonal factor so too did both groups have an organisational factor. Again there were differences for the two groups of respondents in the variables which contributed towards this factor. The variables within the student organisational factor similar to those identified by Fretwell (1980) related to aspects within the clinical learning environment which potentially affected their learning (for example how stimulating and motivating the area was, whether teaching was planned and how relevant it was etc.).

The variables included within the qualified staff organisational factor again originated from two different sources. Firstly were those which related to the aspects of the workload and included amount of work required, fluctuations in workload, deadlines and time aspects. Secondly were those which related to resource issues and included the quality of both the physical and human resources available. Variables within this aspect of the organisational factor included staff shortages, quality of support
staff, shortage of basic (everyday) resources, and the physical environment. All of the above variables have been identified in various studies which have been undertaken over a number of years. These include those by Gray-Toft and Anderson (1981), Dolan (1987), MacLellan (1990), and Foxall et al (1990). Again whilst these studies support the reliability and validity of the present findings so too do they confirm that variables identified within the qualified staff organisational factor originate from a variety of aspects within the clinical learning environment. The finding that variations in the resource factor scores not only occurred between clinical units but also between clinical areas within the same unit suggested that the issue of resources, rather than consisting of simple differences in resources budget, may have intervening variables and thus be a more complex situation. The whole issue of resource management would therefore appear to be an area which warrants further investigation.

Although it was not an original objective of this study to identify and compare the pattern of patient care used in the various clinical areas it was noted that those areas ranked highest by students used a primary nursing care approach, whilst team/task based areas were ranked lowest by these respondents (see table 16). Conversely there was a tendency for qualified staff to rank highest (ie less stressful) those areas where team/task based approaches to care were used, whilst areas using a primary nursing care approach were ranked lowest and tended to have a higher stress score. Whilst it is only possible to speculate on the underlying reasons for this it is suspected that students gained much satisfaction from a primary nursing care method as it allowed them to use their knowledge and a variety of skills when carrying out holistic patient care, all of which would potentially enhance their learning in the clinical area. On the other hand qualified staff may,
as suggested by Lyth (1988), have found the decision making activities encompassed within this pattern of care rather stressful and thus resorted to task/team based approaches. It is however stressed that caution should be exercised when interpreting these findings as determination of the pattern of care in use was only made by briefly and informally discussing the issue with various members of staff in each clinical area within the local hospital. The relationship of primary nursing care to the satisfaction of students and its tendency to increase stress of qualified staff would however appear to be an area which warrants further more detailed investigation.

Present findings in respect of the organisational factor suggested that students satisfaction was directly related to aspects within the clinical learning environment which potentially affected their learning, whilst variables which affected the perceived stress of qualified staff originated from both workload and resourcing issues. It would therefore appear that the lack of any identified relationship between the organisational factor for qualified staff and student nurses may again be attributed to the fact that the variables within this factor originated from different sources for the two groups of respondents in the present study.

In the light of the findings from phase 2, and following a period of reflection, it is now considered that data pertaining to other possible intervening variables should have been collected. The pattern of patient care has already been mentioned as a possible intervening variable, but so too are there other potential intervening variables in the stress/satisfaction relationship. In particular data regarding the length of time students and qualified staff had been in the nursing profession was not collected, yet findings by Veninga and Spradley (1981) and Pines et al (1981)
suggest that not only do all individuals start their professional career with an enthusiastic ‘honeymoon’ phase but within two years these same people can be in the early stages on burnout. It is therefore possible that nursing staff in any one clinical area may have been in different stages of the honeymoon, stress and burnout scenario which could explain why there was no correlation between the perceived stress of qualified staff and the satisfaction of students in the same clinical area. Although Chiriboga and Bailey (1986) found stress was highest among younger qualified nurses, and Tyler and Ellison (1994) found social support sources outside nursing were the most effective stress reducing strategies, data relating to these issues was also not collected.

Another potential intervening variable was the fact that student respondents were either undertaking the traditional RGN training or the newly introduced Dip HE/RGN course. Data relating to the type of course was however not collected, yet aspects within these differing courses could have caused the increase or decrease satisfaction levels perceived by students with the clinical learning environment. It is however open to speculation whether all or some of these variables would have proved useful in the identification of any relationships between stress in qualified nursing staff and satisfaction of students.

**Conclusion**

Overall it would appear that whilst the reliability and validity of both the staff stressor scale and the clinical learning environment satisfaction scale were acceptable there is a need to carry out further studies to assess the predictive validity of both these scales. The emotional response measure which should have provided a common point of reference and comparison for both
qualified staff and students was found to be unsuitable for its intended use. Whilst both groups of respondents had factors relating to organisational and interpersonal aspects the lack of statistical evidence to support the original hypothesis may have been related to the fact that variables for both these factors were derived from different sources for the respondents within each group. As stress and satisfaction appeared to differ between clinical areas it would seem that the underlying reasons affecting these two factors could be derived from facets unique to each clinical environment. Hindsight also suggests that data relating to other intervening variables may have helped determine whether there was a relationship in the identification of the stress/satisfaction relationship.

Although support for the original hypothesis was not identified, and the whole issue of whether any relationships existed between stress, satisfaction and perceived emotions were more multifarious and subtle than I had first imagined, intuitive knowledge gained as a qualified nurse and later as a nurse tutor suggested that there was a link. Rather than accept the fact that it may not be possible to identify the relationship between these variables I decided that it was an important issue which warranted further investigation. Two particular methodological approaches were considered.

The first of these was to test the tools across a wider population and at the same time collect information pertaining to other variables. The obtained results could then be compared with those obtained from more recently developed and validated measures in order to determine the predictive validity of the present tools. The alternative to this was to explore the issues in greater depth using an inductive approach. As the weight of evidence, identified during phase 2, suggested there was a need to explore the
complexities in the relationships which existed between variables, I considered that the latter of these two possible approaches was the most appropriate choice. Not only would it enable me to gain an ‘insider view’ of the clinical environment, but so too would it provide me with an opportunity to assess the predictive validity of the instruments, developed during the early phase of the study, against data obtained from an alternative methodological approach. The methodology and results of the qualitative phase are discussed in the next chapter.
Chapter 6

Phase 3

Qualitative Study

6.1 Introduction
As indicated in the previous chapter the results I obtained during the quantitative phase of the study were inconclusive and did not appear to support an association between the stress perceived by qualified staff and the satisfaction of students within the same clinical learning environment. I therefore decided at this stage to revisit the original problem and explore it using an inductive qualitative approach. I considered that this approach to the problem would provide me with an opportunity to study the experiences of participants working in the clinical environment, as well as enable me to explore the meaning and interpretation of these experiences in depth and detail, neither of which had been possible in the previous quantitative phase.

Three methodological approaches - ethnographic, phenomenological, and grounded theory - were considered as potential methods by which the aim of this phase of the study could be achieved. The ethnographic approach, which would have provided me with the opportunity to become part of the nursing culture within the clinical environment, was extremely appealing, however this method had one major drawback. As I was well known as a nurse tutor to most of the potential informants I felt they would find it difficult to let me be fully integrated into their culture, and thus I would not achieve the intended aim of the study. Of the two other alternatives -
phenomenological and grounded theory - I decided that the grounded theory method, as described by Glaser and Strauss (1967), was potentially the more appropriate. Not only would it enable me to develop a theory through the process of constant comparison using theoretical sampling but so too would it allow for a systematic approach to the identification, development and verification of relationships between named concepts, and thus the generation of theory. As this method would therefore enable the resultant theoretical ideas to be both grounded in, and developed from reality as perceived by participants, I felt that it was the most appropriate approach of the three possible qualitative methods initially considered. (Further details as to the way data was collected and analysed is contained in sections 6.5 and 6.8).

The design of this phase of the study was thus based on the grounded theory method as described by Glaser and Strauss (1967) and further developed by Strauss and Corbin (1990). Data collection was carried out by the use of unstructured but focused interviews with qualified staff and students within purposefully selected clinical areas. These focus areas were based on the results obtained during the previous quantitative phase of the study. These indicated that there were two clinical learning environments where students were very satisfied (areas 2 and 26) and two areas which students viewed rather negatively (areas 1 and 23). However, relocation of the hospital and amalgamation of wards resulted in area 2 no longer existing when phase three of the study was undertaken. Allocation of students to the three remaining clinical areas - 23, 1 and 26 - occurred during the same module of the course, thus student experiences in respect of assignments, examinations and length of time in training were very similar.
6.2 Outline of the focus areas.
Areas 23 and 1 were two specialist surgical wards within the same clinical unit. (Within a hospital setting the term ‘ward’ is used to indicate a clinical area where patients are nursed over a period of days rather than hours). Each of these wards was officially designated to care for either male or female patients, but in practice allocation of patients to these clinical areas was based on availability of empty beds. Students were allocated to work on ward 23 or on ward 1 for a period of eight weeks. As indicated above, results from phase two of the present study indicated that both these areas were viewed as negative clinical learning areas by the students.

The third clinical environment - area 26 - was a busy acute departmental area. (Within a hospital environment the term department is used to denote a clinical area where patients are nursed for a brief period of time, usually measured in terms of hours not days). Patients in this clinical area were either discharged directly home, or were admitted to various wards. Students were allocated to work in this area for a period of four weeks. Results from phase two indicated that this area was considered by students to provide them with a positive learning experience.

Each of these three clinical areas had a hierarchical structure with a leader (Sister) graded as a ‘G’. Other staff included staff nurses - who held ‘F’, ‘E’, or ‘D’ posts, Enrolled nurses who held ‘E’, ‘D’, or ‘C’ posts, and care assistants who occupied ‘B’ or ‘A’ posts. Student nurses were allocated to work on both the specialist surgical wards and the departmental areas during the first part of their third year of training.
There were however two important differences in the focus areas for this phase of the study. The departmental area catered for patients who were critically ill/injured, and were only nursed in the area for relatively short periods of time before they were admitted to a ward. Staff in this area were thus only exposed to short term, highly intense emotional and physical contact with patients. On the other hand the specialist surgical areas, which catered for patients over a longer period of time, provided staff with the opportunity to become more emotionally involved with their clients.

The second difference between these clinical areas was the fact that students were allocated to the departmental area for four weeks experience, yet were allocated to the specialist surgical areas for eight weeks. Personal experience as a student, ward sister and finally a tutor suggests that it normally takes a minimum of two weeks for a student to settle into a new clinical learning environment. Feedback from students (during my time as a tutor) also suggests that four week allocations tend to create more anxiety for them than longer eight week placements.

It is therefore accepted that the environment for the qualified staff and students working in these clinical areas was potentially very different. Added to this was the fact that the three areas were from two units (departmental and specialist) which meant that staff in each area was responsible to a different manager. However balanced against these differences were two positive reasons as to why these clinical areas should be studied. Firstly was the fact that allocation of students to both the specialist surgical areas and to the departmental area occurred during the same module of
training. Secondly students had identified these areas as very negative or positive learning areas. I considered that the choice of these clinical environments would, within the parameters of a grounded theory approach, enable students to compare and contrast their experiences in these two units. Added to this data from qualified staff respondents in the same clinical areas, would potentially provide a rich source of information whereby commonalities and idiosyncrasies could be identified. I therefore made a decision that the three areas described above would form the focus for the third phase of the study.

6.3 Design of the study
The design of this phase of the study (as outlined in section 6.1) was based around the need to carry out unstructured but focused interviews with qualified staff and students working in the purposefully chosen clinical areas. I elected to ask for volunteers from all students who were allocated to these clinical areas during a twelve week period, as well as a ‘typical’ cross-section of qualified staff working in these areas. Apart from the fact that the term qualified nurse should include both registered and enrolled nurses, I felt it important that all qualified informants should have had sufficient time to adjust both to their qualified role as well as their working environment. I therefore decided that the qualified staff participants should fulfil the following criteria:-

a) be registered or enrolled nurses
b) have worked in the specialist are for more than three months
c) have been qualified for more than three months.

All interviews were carried out by myself.
6.4 Ethical and Entry Considerations

Prior to commencement of the study the question of ethical issues associated with the research were addressed. Two main aspects were considered - those which related to the focus areas and those which related to individual informants. In respect of both these aspects issues relating to informed consent, voluntary participation, anonymity, and confidentiality were considered.

Ethical approval for the extension of the originally agreed study was granted by the Ethics Committee. Following an explanation of this phase of the study to the unit managers and area leaders I was given permission to enter the clinical areas and carry out the study. Entry permission was accepted as meaning the leaders had volunteered the participation of their clinical environment. The area leaders were informed that a necessary part of the study was the identification of both positive and negative aspects from informants, but this would be carried out with non-maleficent intent. Anonymity of each clinical area would be achieved by removing potential identification details from the transcripts. Area leaders were informed that information given by informants would remain confidential to myself unless I considered client care could be compromised if the information was not passed on to the senior nursing staff. Apart from area leaders agreeing to grant me access to their clinical areas, they also gave me permission to record field notes during my various clinical visits and use these to inform the discussion on the emerging issues.

Once I had been granted access to the clinical areas a letter explaining the proposed study was sent to all potential participants in the selected clinical environments. The content
of this letter outlined the reasons why I needed to study different environments in greater depth in order to fully investigate the effect qualified staff stress had on student nurses.

The problem of informed consent for both the clinical area leaders and individual informants was a difficult issue because the very nature of an inductive approach made it almost impossible to inform either the leaders or the participants of the exact direction the study would take. However, using the principle of respect for autonomy as a guide to the process of informed consent, it was ensured that all those taking part in the study (the area leaders acting on behalf of their staff in the clinical environment and individual informants) were aware that participation was voluntary and each person in these two groups was informed of their right to withdraw at any time. Anonymity of participants was achieved by ensuring that the informants personal names, which may have been used during the interviews, were not transcribed but instead a code number was used to identify each individual. To ensure names of informants did not become known by any one other than myself secretarial assistance was not sought for the transcription of these interviews, but carried out personally. The list of informants and their relevant code numbers was retained by myself and kept in a locked cupboard at home. Added to this minor details were changed on some transcripts to ensure that not only would informants not be recognised but neither would the clinical areas where they worked. Verbal permission to tape the interview was also obtained from each participant. Each of the participants was informed that the tape would be transcribed by myself and the tape would then be ‘cleaned’ and only the ‘hard’ copy would be retained by myself.
The issue of confidentiality of information also caused me some concern. I was aware that participants may, during the interviews, divulge information which could be detrimental to client care. Therefore a conscious decision was made that at the beginning of each interview the attention of participants would be drawn to the fact that any areas which could be considered damaging to client care would be discussed further with them, and the matter might be have to be referred to the area leader/manager.

Prior to commencing the study I also considered the fact that I, personally, could encounter some role conflict within this qualitative investigation. On the one hand I was in the role of a researcher, yet was acutely aware that I might also slip into the role of counsellor. Although Smith (1992) and Wilde (1992) stress the importance of the researcher's role as that of an investigator I decided, prior to commencing the study, that should any individual become distressed during the interview I would apply the first principle of ethical research - which is to not leave a person in distress. I decided I would therefore stop recording and offer some supportive intervention and possible follow-up. In fact this situation was not encountered.

Apart from the ethical issues mentioned above there was also a need at this time to consider various aspects for when findings from the study were published. Whilst I considered it acceptable that individuals might be able to identify their contribution in the verbatim transcripts, codes were used for all participants so they could not be recognised by other respondents or colleagues. Alongside this details relating to the precise location of the hospital and the actual clinical areas involved have been altered so they too are not recognisable.
6.5 Procedure
To ensure that all qualified staff and students working in the focus areas were aware of the research I was undertaking each individual was sent a letter outlining the proposed study. This clearly stated that I was a Tutor in the College of Nursing who was interested in aspects of work which caused them to feel under stress. This letter included the fact that each interview would be tape-recorded, but anonymity of each individual would be ensured by the use of code-numbers known only by myself. Following the distribution of this letter a personal visit was made to each clinical area so that issues of concern for the staff could be clarified. Only then were the qualified staff and students invited to contact me if they wished to be interviewed as part of the study. A purposeful sample of both qualified staff and students was chosen from those who volunteered, and I arranged a mutually agreeable date and time for the interview.

All interviews were conducted by me personally in a quiet room attached either to the clinical area, or in the College of Nursing. Care was taken that no interruptions occurred. No time limit was set for each interview but it was noted that the range of time varied from twenty minutes to one and a half hours with a tendency for those with qualified staff lasting the longest.

All participants had previously been informed that each interview would be tape-recorded. To reduce the possibility of participants feeling self-conscious about the taping procedure, a tape-recorder with a built in microphone was used and placed in a discrete position in the room. Each interview started with a few minutes of general conversation during which issues relating to confidentiality and anonymity were discussed and verbal permission to record the conversation was obtained.
Participants had previously been informed by me that I was interested in finding out from them what areas in the clinical environment they perceived as stressful therefore thus, once each individual appeared to be reasonably relaxed, they were encouraged to talk about their experiences within their clinical working area. The initial interviews were undertaken with student nurses and based on a reflective approach whereby I attempted to encourage the participant, by the use of paralinguistics (e.g. nods and smiles) to reflect/develop their own responses. The use of this approach minimised the opportunity of my directing the interview in the direction dictated by my own values. However as the study progressed the interviews became more directed and deliberate in an attempt to maximise any relationships between the identified categories. At this stage of the study both students and staff were interviewed until a stage of theoretical saturation had been reached.

I considered it important to make some field notes during the interviews, but was aware that these could potentially make some participants feel intimidated. To overcome this problem the recording of field notes was carried out discretely and was kept to a minimum. These field notes were used later to inform the discussions on emerging themes.

6.6 Student Nurse Sample Group
All 20 of the student undertaking the Diploma in Higher Education/RGN course volunteered to be included in the study. However two of the students were off sick for more than 2 weeks during the first of their clinical allocations so they were excluded from the sample group. The remaining student
participants (N=18) were from varying age groups. Although the majority were under 30 years old, the age range was from 21 - 45. Six of the group were married or divorced - all had children in the under 12 age group. One of the sample group was male, single and under 30 years old.

The academic level of the sample group varied considerably from three students who each held two 'A' levels at grade C and above, to 2 students who had been accepted for the course as they had passed the DC test (The latter was the accepted alternative for entry for candidates not holding the required five GCSE subjects).

Students were interviewed on two occasions - once after allocation to the specialist surgical unit and again after allocation to the departmental area. Each of these student interviews, which took place within four days of their having completed the clinical allocation, enabled them to make comments about their experiences whilst memories were fresh in their minds. At the second interview students were also encouraged to compare and contrast their experiences within the two clinical environments.

6.7 Qualified Staff Sample Group
In accordance with the design (see section 6.3) a purposive sample was selected from those qualified staff who replied. This method allowed me to select participants on the basis of achieving a similarity between each of the three clinical areas. Four participants were chosen from each clinical area
a) two full time staff nurses
   - one who had been qualified for more than
three years and was an ‘E’ or ‘F’ grade, and
one who had been qualified for less than a year
and was therefore a ‘D’ grade
b) a Bank staff nurse - ‘D’ grade
c) an Enrolled nurse - ‘D’ or ‘C’ grade

Although the ‘G’ grade departmental leader volunteered to be interviewed neither of the ward leaders on the specialist unit did. To ensure parity between areas a decision was thus made not to interview the departmental leader.

An additional participant was included from one clinical area as this staff nurse had recently completed the Enrolled Nurse to Registered Nurse conversion course. This staff nurse had not only worked in one of the focus areas before undertaking the full-time course but had then returned to work in the original area once registered. In the interim period this individual had worked as a student nurse in various other clinical areas in the Hospital including those in the other focus areas of this study. I considered that the recent experience of this individual would contribute well to the overall study. The sample group of qualified nurse informants was thus finally composed of thirteen female staff:-

Specialist area 1 = Four
Specialist area 23 = Five
Departmental area 26 = Four

The overall sample of qualified nurses included one staff nurse who had trained in another hospital and had moved after six months post qualification, and a staff nurse who had worked in another area within the hospital in the study and moved to the one of the focus areas after six months qualification. Two of
the Bank staff nurses had previously worked in the grade of ward sister before leaving to have a family.

6.8 Data Analysis
As soon as possible after each interview the tape was transcribed, and analysis was commenced. However in order to keep an open mind and not allow myself to be influenced by the findings of phase two, I initially carried out four interviews with students before I started the process of 'constant comparison' between the collected data and its analysis. Transcript analysis was based on the three levels recommended by Hutchison (1993) - coding, categorisation and finally construct formation. The initial level of open coding involved a line by line examination of the transcripts in order to identify salient and/or persistent words and phrases. By breaking down the data into observations, sentences and paragraphs I found it was possible to give each discreet incident a code name which represented the phenomenon for which it stood.

As data was collected comparison of incident with incident was carried out so that similar situations were identified and coded in like manner. The actual linkage of codes to categories was based on a set of relationships described by Strauss and Corbin (1990) as causal conditions, phenomena, context, intervening conditions, action/interaction strategies and consequences. For example “excessive workloads” (causal condition) gave rise to “some staff go off sick” (phenomenon). This resulted in “employment of many Bank staff on each shift” (action strategy) which led to the permanent staff feeling “very stressed as the bank staff do not want to take on any
responsibility" (consequence). Although, as indicated by Strauss and Corbin (1990) not every relationship applies to every situation the use of this approach enabled me to identify how these relationships facilitated or constrained the action and consequences. The identification of connections and relationships between the phenomena gave rise to the development of categories. Throughout the period of data analysis which (bar the first four interviews) was carried out at the same time as data collection, I found it was necessary to revisit transcripts which had already been analysed in order to re-code and re-examine relationships between the codes.

The final stage of the data analysis was the identification of construct. Construct formation was undertaken in a similar manner to that employed for category formation except it utilised a higher and more abstract level of analysis. As data analysis progressed it became apparent that there was a core variable which was the 'cement' which held the developed theory together.

6.9 Validity and Reliability
Trustworthiness, the term used in qualitative research to ascertain validity and reliability, was addressed in this phase of the study using the approaches of credibility and transferability as described by Guba and Lincoln (1989). As the grounded theory approach involves a constant comparison between the data collected and the analysis of that data I was acutely aware that values and biases, gained during my involvement with the first two phases of the study, could influence the collection and analysis of the data, which in turn could affect the credibility of the findings. Two strategies were employed to address the
issue of credibility which could be affected during data collection and analysis. The first of these was contained within the interview itself during which I encouraged informants to reflect/develop their own responses, which in turn minimised the risk of my introducing my own values and biases.

The second strategy I used to increase the credibility of the findings was based on the approach used by Krippendorfer (1980), who suggested that reliability and credibility of qualitative research findings can also be demonstrated when the same text is coded in the same way by more than one coder. Thus apart from myself carrying out coding and categorisation two colleagues were also given transcripts of the interviews and, without reference to each other, undertook coding and category formation. Regular meetings took place between us to discuss the evolving codes and categories. Subsequent interviews with participants used a reflective approach to focus on these evolving codes and categories in an attempt to identify relationships between them. Construct formation was carried out by myself and a third colleague. Although the actual wording used for naming the constructs was slightly different, the underlying concepts were the same. For example my colleague had worded it “the working environment and its organisation”, whilst I worded it “organisation of the working environment”.

Although I consider that the reproducibility between my colleagues and myself was very high, the credibility of the actual findings relies heavily on the interpersonal skills I employed during the interview. In particular the use of non-verbal skills may (for example by the use of a raised eyebrow etc.) have encouraged informants to reflect on an aspect on my
choosing rather than their own. Although this may have been the case yet another approach by which the credibility of a study can be established is that described by Sandelowski (1986). This involves participants having the opportunity to review the findings of the study and determine how far these are a fair representation of the situation as perceived by themselves. Using this approach one of the participants - an individual who had recently completed the Enrolled Nurse to Registered Nurse conversion course - was sent the findings related to this phase of the study and asked to read and comment on the results (see Appendix 10). Based on the combination of these three approaches I consider that the findings have a high credibility.

The second aspect used by Guba and Lincoln (1989) to establish trustworthiness is that of transferability whereby the underlying concepts and the resultant theory can be applied to a wider population. This, according to Strauss and Corbin (1990) can best be achieved when widespread theoretical sampling occurs. The focus areas used during this phase of the study were environments perceived by students as positive or negative therefore, as such, it could be argued that informants were from a widespread source. Although, within the constraints imposed by the ethical aspect of voluntary participation, I initially chose a purposive sample of informants from these three focus areas, I adhered to the principles of theoretical saturation. This involved my interviewing participants until I considered that I had reached a situation whereby the quality of the developed theory was rich, complex and saturated. I actually found that theoretical saturation was reached before I had finally interviewed the last two participants in the purposive sample. As I had confirmed to all individuals
in the sample groups that I would arrange a date and time when to interview them I felt morally obliged to include these two informants. I consider that the combination of informants from clinical areas perceived as positive or negative, together with the fact theoretical saturation was achieved, has established the transferability of the findings.

Although it could be argued that the third approach described by Guba and Lincoln (1989) - dependability should also have been addressed, it is considered by Robson (1993) that any study which demonstrates credibility is also dependable. As I consider this study has demonstrated high credibility a limited approach has been made to demonstrate its dependability. The reporting of this phase of the study is however based on the use of a “decision trail” (Koch 1994 p976) whereby events, influences, and actions I undertook have been described. According to Koch (ibid.) this allows auditing to be carried out and thus dependability to be assessed.

The next section, which examines the findings, has been based on the approach suggested by Glaser (1978). Firstly the most relevant properties of the constructs are discussed before these are addressed in greater detail through the story line, which shows how categories and constructs were developed and integrated to form a theory

6.10 The decision trail - development of theory
6.10/1 Overview of findings
A total of 36 interviews were carried out with student nurses and 13 with qualified staff. Those with students lasted a maximum of half an hour, whilst those with qualified staff tended to last approximately one hour. Although there is a
disparity in the number of informants from each group I consider that the views of the qualified staff are adequately represented. This was confirmed by the fact theoretical saturation was achieved.

Collapsing of the identified codes into categories gave rise to two main constructs - “atmosphere in the work area” and “organisation of the working environment”. An overview of both these constructs is provided in the following sub sections.

6.10/2 “Organisation of the working environment”
This also consisted of three categories - the pattern of care, workload, and the calibre of staff (see Figure 2). The crucial aspect within this construct appeared to be that of the pattern of patient care. If the latter caused dissatisfaction among the staff, or was perceived as unnecessarily increasing the workload, it increased the tendency for staff to leave the job or take sick leave. This led to the employment of bank staff to ensure there were adequate staffing levels. The lack of trust between the permanent staff and the transient bank staff resulted in the adoption of a well-controlled pattern of care (ie task based).

![Figure 2](image_url) Overview of the construct “Organisation of the working environment”
Atmosphere in the work area

The atmosphere of a work area was described by interviewees as "the climate", "the quality of the workplace" or as one student said "the personality of the ward". Three categories contributed to this construct - development of relationships, personal development and level of support (see Figure 3). The level of support for individuals, appeared to be the crucial aspect which ultimately determined the development or not of the other two categories. Good support systems encouraged relationships within the working team and thus interpersonal trust developed. In turn this allowed for the delegation of responsibility and therefore personal development for individuals.

Figure 3 - Overview of the construct “Atmosphere in the Work Area”

Coding and its relationship to category formation

In both of the constructs indicated above a number of codes combined to form each of the categories. Whilst an example of how some of the codes contributed to a category is given in Figure 4, a full list of all the identified codes and their related categories for both of the constructs is provided in Appendix 11.
6.10/5 Development of the theory

Based on the fact that students originally found the three focus areas either 'positive' or 'negative' learning environments, together with the identification of the two constructs mentioned above (i.e., atmosphere and organisation) the following detailed account of the findings has been subdivided into four sections, one section for each of the four possible combinations:

a) organisation of the working environment in the 'positively perceived area'

b) organisation of the working environment in the 'negatively perceived areas'

c) atmosphere in the 'positively' perceived work area

d) atmosphere in the 'negatively' perceived work areas

The reporting of this phase of the study also includes quotes from various members of staff to enhance the text, support the validity of the emergent themes, and show that the theory arises directly from the data. The individual source of each quote is indicated by the participants code number which is prefixed by 'T' for a trained respondent, or 'S' for a student,
together with SU to denote specialist unit and DU to denote departmental unit. As participants were from areas 1, 23, and 26 these numbers are used to indicate the source of the clinical area. Therefore T2 SU23 - indicates the individual is a trained member of staff working in the specialist unit on area 23.

An example of a full transcript from a qualified nurse and a student are given in appendices 12 and 13 respectively. A discussion based on the findings of this phase of the study, together with a review of related literature is included after the findings have been reported.

6.11 Organisation of the working environment in the positively perceived area (Departmental area)

In area DU26 a modified form of primary nursing care was employed. Within this pattern of patient care qualified staff and students not only worked alongside each other to care for the patient from time of admission to the department until discharged (home or to another clinical area), but so too were they delegated the responsibility and accountability to make autonomous decisions. Expert help and advice was available from the ward sister as required. All participants indicated that they enjoyed this approach as it gave them the opportunity to

“see the patient right through the system... there is always somebody I can go and talk over problems with and ask for advice” (T13 DU26).

Not only did this method give the staff much personal satisfaction, but they also felt supported and thus more able to support students. The qualified staff considered that the
autonomy embedded within this approach also allowed them to involve the student in the care of the patient as well as delegate aspects for the student to carry out. Staff regularly discussed with the student aspects within the care which should be considered, and they also encouraged students to suggest ways of improving the patient care given. According to students this approach to care, and the support they received, enabled them to gradually increase their contribution to the care of the patient.

Participants from the departmental area indicated that the primary nursing care approach gave them more autonomy in their work and thus more job satisfaction. It could however be argued that patients in the departmental unit were only there for a relatively brief period of time. Consequently, staff were potentially more able to sustain care and its associated level of accountability without becoming unduly anxious. However the serious nature of injuries/illness of the patient and thus the intensity of the care required were such that much anxiety and stress could result. Findings from this study (see section 6.13) suggest that any inherent anxiety may have been mitigated by the good support systems present in the departmental unit.

Due to the clinical nature of the work in the departmental unit the level of workload could fluctuate dramatically. Although potentially this could lead staff to perceive a lack of control over the situation, it did not appear to cause staff much anxiety. Participants considered they were able to prioritize their work as they had the autonomy to do so. Providing the safety aspects were ensured, the "niceties - like washing a patient" (T12 DU26) could wait until they had time to do it. By utilising
this approach the staff appeared to feel more in control of the situation and thus did not get too anxious.

Students enjoyed working in this area, although occasionally staff did not always appreciate having students on duty!

"...like yesterday when a lady I had been talking to 'went off' on me. She wouldn't respond when she had been talking to me! I asked a student to get the doctor quickly, but she said she had only come in to get the keys! I shouted crash call and then she moved!" (T11 DU26)

It was indicated by this staff nurse that later after the emergency was over she took the student to one side, apologised for her behaviour and then explained and reflected on what had happened. Students appreciated staff taking the time to explain what went on and why certain actions were taken.

Within this unit there was minimal turnover of staff, and consequently few bank staff had to be employed. Transient staff - students and bank/agency staff - appeared to be 'adopted' into the team. They did not appear to be regarded as 'outsiders' or 'intruders' into the environment. Unlike their experiences in the specialist unit students did not indicate any problems associated with working with bank staff in the departmental area.
6.12 Organisation of the working environment in the ‘negatively perceived areas’ (Specialist areas)

According to participants "..the overall management and organization of the working environment belongs to Sister" (T5 SU23). The main area which this appeared to affect was that of the pattern of care adopted for use within the area. Although various approaches (e.g. team nursing, primary nursing care) are available, the leader in the SU1 area had adopted a task-based approach. This method involved the completion of work by the use of tasks rather than an holistic approach to care. Allocation of work appeared to be based on seniority of the staff member, the need to give a student experience of certain tasks or, as several participants indicated “..whether your face fits”.

Although many of the student participants considered that much of the work was based on the use of "rituals", trained staff who had been qualified a number of years indicated that this approach provided them with a "security blanket" (T9 SU1). These staff considered that this approach helped to ensure that all the work which was deemed necessary was carried out. The use of this task-based ritualistic approach caused most of the students and the recently qualified staff to feel that they were "sliding into a rut" (T7 SU1). These participants wanted to use the problem-solving, reflective approach which had been encouraged throughout their training. Most perceived a lack of stimulation in their work and they felt "despondent and frustrated" (T8 SU1) with the job. They felt their status meant "nothing" (T7 SU1).

"Why I trained for three years I do not know - I could do the job without having to think let alone be trained to do it" (T7 SU1).
All of the students and most of the more recently qualified staff participants in the specialist area wanted to change to a more holistic and individualised approach to patient care. It was even suggested by some staff that the ward sister perpetuated the task-based ritualistic method, not because it ensured a good standard of care for all, but because the leader was reluctant and possibly "scared of any changes" (S21 SU1).

The participants in area SU23 of the specialist unit identified the way they worked as team nursing as staff were split into teams to care for a specific group of patients. Members of each team were responsible to the team leader. However, a number of the qualified staff and students indicated that a task-based method was still employed, albeit within a team approach. Although team leaders considered they had autonomy within their work areas, other qualified staff felt they had little control over the way they worked. However, it was the team leaders who perceived they had the most stress, which they attributed to the amount of responsibility encompassed by the role of team leader. Although task-based nursing care was still practised in the ‘team’ approach, students found that their needs and capabilities were more quickly recognised when working in a team. They attributed this to the fact that qualified staff had more opportunity in a smaller team to get to know their capabilities. Students also felt more accepted as a team member when working in a smaller team, than when working as part of the total ward nursing team. However it became apparent that task-based nursing care approaches provided students with the least satisfactory learning environment.

These findings appear to support those of phase two (see Table 16) where overall stress in qualified staff tended to be
lowest in areas where task/team approaches to care were used, whilst students were least satisfied by this pattern of care. As student nurses are now taught to use an holistic, reflective approach to patient care, any method of care which does not use this approach may increase the perceived dissatisfaction of the students. However, many qualified staff were trained using a task-based approach and possibly feel more secure and comfortable with this approach. If this is the case then it could explain why no relationship was found in phase 2 between the perceived stress of qualified staff and the satisfaction of student nurses in the same clinical area.

Within both of the specialist areas it was noticeable that some staff appeared to lack enthusiasm for work. They mentioned the fact that they wanted to initiate new ideas but after a while had given up.

"You can only bang your head on a brick wall for so long until it hurts - then you stop"
(T5 SU23).

The method of care within both areas of the specialist unit was viewed by qualified staff and students as creating a lot of unnecessary work. They felt that many rituals were carried out even though there was no need for them

"..like changing sheets every day" (S17 SU23), and

"Sister insisted that beds were made from top to toe and not the other way round, although it is often easier that way if there is a patient in the bed. In fact
one day she noticed somebody doing it toe to top, 
and she made them strip it off and start again" (S22 SU1)

This extra work resulted in many of the staff and students stating that they felt "weary and exhausted" (T6 SU1). To ensure the work got done, they indicated that they resorted to the employment of further rituals and routines thus a perpetual cycle resulted. Students and staff also felt that many of these rituals like "soaking feet in bowls daily" (S24 SU1) adversely affected the patient.

"We give everybody a full wash every day - some of the elderly don't do it like that at home so why do we have to do it here" (T2 SU23)

"This particular patient had got back to bed for a rest after lunch. There were no spare blankets to cover him, and as he felt cold I pulled up the bedclothes. Sister screamed up the ward and insisted that the bedclothes had to stay folded at the bottom of the bed for night use only. We covered the patient with a double sheet. To me this was only done to keep the ward tidy - what about patient comfort!" (S25 SU1)

These situations resulted in much conflict for the staff as their actions conflicted with their own personal values.

Encompassed within the category of care was the amount of consideration the ward leader provided for the staff. The main problem encountered was the amount of overtime which was entailed. Providing this was viewed as essential for patient care
nobody complained. However, some staff felt that it was often due to "total mismanagement" (T7 SU1) and this caused much aggravation.

"There are lots of times - most of the time - when I get off late. The patient work stops at 3.15 and the office work starts, so I get off about 5pm. It can be so frustrating. I cannot take myself off the ward to do the office work when I know something needs doing on the ward. I can't leave a patient who needs a bed pan just because I have paper work to do" (T5 SU23)

It was indicated that this type of problem occurred frequently. Although some staff attributed it to the amount of extra work created by the ritualistic practices, other felt that it was the attitude of the leader which perpetuated the situation. "The two Sisters (on SU1 and SU23) stay on late and expect you to do the same" (T6 SU1). Although ‘on paper’ participants felt they were reasonably well staffed, in practice they felt they were understaffed. They indicated that this was mainly due to staff sickness although some was attributed to the fact that staff had left the job and not been replaced. Consequently, staff had to work unpaid overtime in order to complete their work. It therefore appeared that a vicious cycle of events was perpetuated whereby ritualistic practices increased the required workload. This, together with the attitude of the ward leader, increased the amount of sick or absence time which staff accumulated. Consequently there were fewer staff on duty, working in “an atmosphere” (T5 SU23) and attempting to complete a heavy workload.
To overcome staff shortages bank or agency staff were employed to ensure sufficient staff were actually on duty. Some of these bank staff were employed regularly within the same area and were accepted as

"one of the team .. they know what to do, they understand the routine of the ward and they get on with the work" (T5 SU23).

These individuals were regarded more as ‘part-timers’ as they worked whole shifts rather than parts of the shift which other bank staff worked. However, other bank staff were used to increase staffing levels within the clinical areas in fact "..about 50% being bank on most shifts" (T4 SU23). These individuals were not always employed in the same working environment. They were therefore perceived by participants as not knowing how to nurse specialised patients, which caused some of the permanent staff to regard them as a "liability" (T7 SU1). This type of bank/agency nurse was viewed as potentially causing problems rather than resolving them.

"I came on duty on a late shift and had on an auxiliary nurse, a bank staff nurse and an agency staff nurse. The latter two had not worked on the ward before - it looked good on paper! I had five patients going to theatre who would return to the ward with an epidural. When I went to collect the first one, she had respiratory problems. I told the anaesthetist it wasn't safe to have her back with the staffing levels I had on the ward... In the end he agreed to send this patient and two others to another ward. By the time I had gone to theatre several times I felt I had spent the
whole of that shift fighting a battle for these patients, and also directing nurses who really didn't know anything about the speciality. I felt angry, frustrated and didn't have a clue what care anybody had had. I just knew that those I had accepted from theatre were alive, their drips were going, and that they had had pain control. I was snappy with the nurses. I remember snapping at one of the agency nurses when she was taking a TPR. I didn't realise how stressed I was until later. I was still angry the next day!" (T5 SU23)

This scenario was not atypical. Many of the qualified nurses indicated that they were left with bank or agency nurses to staff the wards. These individuals, through no fault of their own, neither knew the environment, nor the intricacies of the specialised nursing required. This "lack of quality staff" (T2 SU23) caused much anxiety to the permanent qualified nurses.

The inclusion of students in the off-duty numbers also created anxiety to the staff. Although student nurses were eventually found to be "valuable assets" (T4 SU23), when they first arrived on the ward they needed much looking after. Whilst qualified staff enjoyed having students allocated to the area, it also created problems for them. In particular qualified staff found it difficult to balance their own work against the needs of the students.

Students were also affected by the bank/agency staff scenario. Due to staff shortages the permanent member of qualified staff was usually 'in charge', and students were often left to work with the bank staff. Students felt that they were not being
adequately supervised, and thus were not learning as much as they should. Many of the student participants indicated that they were often in a position of knowing more than the bank staff, and therefore often had "...to guide (these) qualified nurses in their work" (S22 SU23).

There was also a tendency for some of the bank staff to feel "threatened" (T3 SU23) by the questioning approach of students. Many of the bank staff participants did not appear to know that students are now encouraged during their training to be more questioning.

6.13 Atmosphere in the ‘positively’ perceived work area (Departmental Unit)

The approach used within this area provided support to staff through the employment of formal meetings. These included regular work group meetings and critical incident support group meetings. The work related meetings provided the opportunity for staff to get together during the working week and discuss aspects which they felt needed attention. Staff regarded these as informative and constructive.

Support after critical incidents was also provided. These meetings gave all grades of staff (nursing and others) the opportunity to express feelings and thoughts in a confidential and supportive environment. The sessions were viewed as helpful in reducing the anxiety and tension associated with the incident. Apart from these formal approaches informal meetings between staff took place in the work area during the working day. Staff not only regarded these informal meetings as "a chance to diffuse situations before they get out of hand" (T11
Preceptorship and mentorship programmes were operational in this area. As one junior staff nurse indicated:

"The support scheme here is good, very good. They (the senior staff) think very carefully about you as a person,... then chose a preceptor who would be good for me". (T10 DU26)

Regular meetings took place between the newly qualified staff nurses and their preceptors. "We meet monthly - last week was lunch at the pub!" (T10 DU26). The opportunity to get to know somebody away from the workplace provided both parties with neutral ground where problems could be openly discussed. As this role was new to the preceptor concerned, support for her was provided from the area leader.

Students also indicated that a good mentorship scheme was in action:

"You worked with your mentor on most shifts. They knew how far you had got, and what you needed to know. I had the best mentor" (S9 DU26).

The mentor link also provided the student with opportunities to discuss the application of theoretical concepts to the practical situation. Students found they were encouraged to reflect upon care they would give or had given, and suggest alternative approaches which could be used. It was found that the combination of mentorship, preceptorship and supervisory
support provided all grades of participants with a very supportive working environment.

The level of delegated responsibility helped individuals feel they were valued and appeared to enhance their self-esteem. Staff were encouraged by the leader to form into small groups and take on responsibility for areas within the department. One of the staff concerned proudly talked about the children's play area which

"..our team has organized. We even managed to persuade a local firm to provide the toys!" (T13 DU26).

Whilst the "Sister is always there if we need her, she'll always back us up" and "..she shows a keen interest in what is going on" (T13 DU26), it was clearly indicated by the staff that they did not feel compelled to take up suggestions made by this person. The apparent autonomy and participation perceived by staff in the different activities they undertook appeared to provide them with stimulation and variety at work.

Delegation of responsibility by the leader enabled staff to feel this individual trusted them. A mutual trust of the leader developed, which led to an open trusting atmosphere. Participants indicated that this led to them disclosing their fears, worries and aspirations which resulted in further development of a supportive network among the staff. This climate encouraged all grades of staff to feel they could make suggestions. They felt that "Sister listens ... we can have our say and not feel put down" (T13 DU26). In fact the Sister in this area was regarded "..as an equal and a person" (S2 DU26).
Individual personal development was regarded as an important issue by all staff. Autonomy, responsibility, and academic development were viewed highly. Staff regarded the area leader as the initial person with whom they should discuss their personal professional aspirations. Where 'on the job development' was encouraged, the staff did not express the desire to move jobs to other Units or Hospitals. They indicated that they were happy working where they were and preferred to develop their skills within the clinical area or do part-time courses. In fact one staff nurse was starting a part-time two year Masters degree course, and the Unit had given her paid time off to do so. Thus, the overall ethos within this Unit was one of encouraging and supporting staff to go forward career wise which in turn appeared to help staff cope with the some of the stressors associated with work.

Students indicated that staff in the departmental unit were willing to "let go of the reins" (S1 DU26) and gave the students the opportunity to work on their own and make appropriate decisions on patient care.

"After a few days there I was allowed to do more basics, and gradually they allowed me to do as much as they felt I could cope with. I was allowed my own independence as far as I wanted it - they respected you for wanting that independence" (S1 DU26)

The atmosphere created by the adoption of the participative approach permeated through to all the various disciplines "..even the doctors talk to you as people!" (S7 DU26). Consequently a cohesive team approach developed. Staff enjoyed coming to work. Absenteeism was reported as minimal
"I often go to work when I'm not 100% fit. I cannot let the team down" (T10 DU26).

Ultimately there appeared to be a united team approach.

"Although people are in different uniforms here, it makes no difference whether it's Sister, staff nurse or auxiliary, it's all good team work" (S10 DU26).

The development of these good relationships continued after work. The team often went out together, thus social interaction between staff occurred. Staff and students got to know each other as people and not just as co-workers. Various social activities took place within the work environment - for example birthday cakes were brought in, and swopping of children's clothes took place, - all of which demonstrated the fact that staff were real people.

Where good team relationships existed, students indicated that the staff were usually "supportive and approachable - you know - friendly and sociable" (S5 DU26). This approachability of staff appeared to be an important aspect for students. Not only did it help them to settle into the new environment more quickly, but it also provided them with support during their allocation. Students indicated that

"the best learning areas are where you can ask without being made to feel small" (S5 DU26).

These staff who assisted students in positive ways were viewed as good teachers. This was attributed to their approachability and not necessarily to the fact that they
undertook any formal teaching. Students therefore enjoyed these learning areas.

Staff in this area appeared relaxed, and if the student made inappropriate decisions the staff did not "make mountains out of molehills" (S7 DU26). Instead they were likely to take the opportunity to discuss the various aspects with the student and "turn the mistake into a teaching opportunity" (S7 DU26). Staff were viewed as

"..being so helpful. They want you to learn and they take the time to show you things, and yet you are left on your own to be independent. But if you don't know how to do anything you've always got somebody to turn to - they are really great" (S8 DU26).

Overall students in this clinical environment gave the impression that they felt safe, comfortable and well supported.

6.14 Atmosphere in the 'negatively' perceived work areas
(Specialist areas)
The opportunity for staff to get to know each other as people and not just as co-workers was minimal. "Sister expects us to get the work done. Talking is not counted as real work" (T8 SU1). Staff were not encouraged to talk to patients, or to socialise between themselves which resulted in a lack of any meaningful relationships between the members of the team. Consequently there was "a lot of back biting among the members of the staff" (S25 SU1).
Many of the informants indicated that the leader rarely made anybody feel they were more than "just a pair of hands and feet" (S24 SU1)

"She never asks you if you have had good days off, and she never says goodbye to you. That sort of thing makes all the difference. You felt like a number not a person" (S17 SU23)

There were very few opportunities available for the staff to be able to discuss and defuse their problems either through formal or informal means.

"we haven't had a ward meeting for months. At the last one I brought up the fact that we were under a lot of pressure and that the work load was getting heavier. But all we were told by Sister was that we were being paid to do the work. You cannot work under that attitude... I didn't feel supported by Sister or above" (T7 SU1).

"You give of yourself so much mentally and physically to the patient that it is stressful... you could do with somebody to chat with about how you feel, but everybody is too busy flitting around" (T8 SU1)

Most participants indicated a need to "talk things out of my system" (S18 SU23). This they considered was best carried out by "talking to nurses ...as they understand" (T3 SU23). Although a number of participants considered that they were too busy to spend time supporting colleagues, others felt that they already had too many problems of their own. One even
indicated that she was "reluctant to take on any more" (T8 SU1).

Some participants were able to take their problems home, but this was often not acceptable by those in the home situation.

"I do get to the stage when I feel depressed and feel I cannot cope anymore. I tend to go home and let it all out. We have an arrangement that I am allowed ten minutes.. then that's it. If there was nobody around I don't know how I would deal with it. Mind you its not doing my marriage much good" (T8 SU1)

Ultimately staff learned to cope either by accepting that "the situation cannot be changed" (T7 SU1) or else used sickness as an escape.

"I do know there is a lot of sickness on this ward which is not genuine" (T5 SU23).

When the sickness rates soared, the staff considered it was due to the attitude of Sister. "You can only take so much for so long" (T4 SU23). By taking time off, staff felt better able to cope with the situation when they returned to work.

Although mentorship and preceptorship schemes were in use in these specialist areas, they did not appear to be used very effectively. Off duty was arranged so that on average students were on duty with their mentor about twice a week. Thus, relationships between student and mentor never had time to fully develop. Although this was partly due to the organization of the workload whereby students often did not work alongside
their mentor, the attitude of some mentors appeared to determine how the relationship did or did not develop.

"...you have to be professional. You cannot be all pally with them - you are meant to be teaching them. And anyway they are only here for eight weeks so you cannot get really friendly with them" (T2 SU23)

This 'them and us' approach created a strained atmosphere which was not as warm or supportive as it could be. Consequently students never felt fully accepted as "part of the team" (S25 SU1). In fact one student did not feel she was a full member of the team until she was invited to bring in her own food to heat up in the microwave on a late shift!

Newly qualified staff appeared to gain some support through the preceptor scheme

"...it was nice to feel you could talk to somebody even if it was only over coffee. I felt lost as soon as my preceptor days were finished" (T1 SU23).

However, overall there appeared to be a general lack of good interpersonal relationships within the specialist unit. Added to this staff considered that the employment of a task allocation approach indicated that the ward leader did not trust them. Thus, delegation of responsibility rarely occurred.

"She was planning a holiday, then one of the consultants decided to bring in a couple of majors. She decided her E and F grades couldn't be left holding the fort, and that angered all of us. We are
confident and competent and yet when given the chance to show it the opportunity was taken away. She came in for 3 days of that 7 days". (T7 SU1)

The lack of autonomy created much frustration, particularly for the permanent qualified staff and the students.

"I would like more responsibility - it's the 'top' who won't give it to us. She doesn't allow us to change anything - I would need courage to try and change anything" (T2 SU23),

Hence this individual continued to carry out care the way Sister dictated. However, when Sister was off-duty this individual admitted that "I do things the way they should be done and I just keep quiet - we all do!" (T2 SU23). There appeared to be little encouragement from the clinical leader for any of the staff to undertake any courses. Staff felt "despondent and devalued" (T7 SU1) by this, as they realised that often higher grades were not open to them unless they held certain qualifications.

"I would like to go higher up the ladder and be more challenged by my work but I know that will not happen in this unit".(T2 SU23)

The "..atmosphere in the work area is not very harmonious" (S16 SU23) and was perceived as "..very changeable" (S21 SU1). This appeared to apply equally to both specialist areas and was attributed to the presence or absence of the Sister. "She doesn't need to say anything ...people's attitudes change due to her presence" (S20 SU23). This was noticeable to doctors, ancillary and nursing staff, and even to students.
"I could feel the atmosphere through the telephone, and I hadn't even started work there then!" (S22 SU1).

Consequently a number of participants considered there was a "tension in the air" when Sister was on duty.

"You cannot stand still for a second as she wants to know what you are doing" (S24 SU1).

"The patients were lovely, but you couldn't relax with them - it was inappropriate according to Sister" (S25 SU1).

When a member of staff wanted to hand in her notice she said

"I had to pluck up courage, and choose the best day when she was in a better mood... Since I have told her she hasn't spoken to me!" (T1 SU23).

A number of staff talked about leaving nursing, or moving to another clinical area. In fact several had already left and had not been replaced.

The degree of staff relationships, lack of autonomy, and lack of personal development prospects resulted in a work atmosphere where staff felt "defeated" (T3 SU23), "despondent and frustrated" (T8 SU1). Students felt that qualified staff in these areas were not, on the whole, as approachable as they were in other training areas. "I only felt needed for my hands, not for who I was" (S26 SU1).
6.15 Discussion of Findings from Phase 3

Organisation of the working environment

Within the construct called organisation of the working environment three important themes were identified. These were the pattern of care employed by staff to care for patients, the workload experienced by the staff as a result of the delivery of care, and the calibre of staff available to care for patients. Of these three issues it appeared to be the pattern of patient care employed within the clinical area which affected the job satisfaction of both qualified staff and student nurses. Although the clinical areas studied were very different, there appeared to be two distinct patterns of care in use - individualised care and task-based care. Whilst staff in one of the clinical area studied referred to the approach they used as team nursing, in reality it appeared to be a modified version on task-based work albeit carried out within a team.

Definitions of the various patterns of nursing usually refer to them as primary nursing, team nursing, patient allocation and task allocation (see Figure 5). However findings by Thomas and Bond (1990) in their study of 17 clinical areas suggest that actual operational definitions vary considerably between area. Therefore the descriptions employed by the Audit Commission (1991) have been used to portray the patterns of care found to be in use in the present study (see Figure 5).

The term primary nursing care is therefore used to describe areas where individualised patient care was practised and staff had total responsibility for the patient throughout their stay in the unit. Task-based care describes patterns of patient care which were carried out by a task approach regardless of whether this occurred within a team or not.
Findings in the third phase of the study suggest that both qualified staff and students found much satisfaction working in the area where primary nursing care was used. Based on this finding the following discussion examines aspects of this pattern of care which may have provided the nursing staff with job satisfaction.

<table>
<thead>
<tr>
<th>Task allocation</th>
<th>Each nurse does a particular set of tasks for all patients in the clinical area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Patient allocation</td>
<td>Each nurse looks after the needs of an allocated group of patients for the duration of a shift</td>
</tr>
<tr>
<td>Team nursing</td>
<td>A team of nurses is responsible for care planned and delivered to individual patients throughout their stay in the unit</td>
</tr>
<tr>
<td>Primary nursing</td>
<td>Each patient keeps the same nurse throughout their stay, who evaluates their care and has a 24 hour responsibility for ensuring that care is delivered by him/herself or by one of a small number of associate nurses.</td>
</tr>
</tbody>
</table>

Figure 5  Patterns of Patient Care  
(as described by the Audit Commission 1991)

According to Locke (1976) when a person appraises their total job experience as a positive, pleasurable, emotional state then the person concerned has job satisfaction. In their theoretical model of job satisfaction Hackman and Oldham (1975) suggested that it actually consisted of three critical psychological states - meaningfulness of the work, responsibility for outcomes of the work, and knowledge of actual results. (See Figure 6).
The first of these (experienced meaningfulness of work) can only be achieved when the individual sees the significance of their contribution within the whole situation - i.e. there is task significance. However this is reliant on the individual having both variety within their work (task variety) and involvement with their work from start to finish (task identity). Hackman and Oldham (1975) also suggested that responsibility for outcomes of work can only be achieved if the individual is given the autonomy to make decisions.

However the utilization of that autonomy is dependent on the individual receiving feedback - both from external sources (patients, colleagues, supervisors) and from internal sources.

![Figure 6 The Job Characteristics Model (Adapted from Hackman and Oldham 1975)](image-url)
Reflection upon work undertaken will thus provide the individual with internal feedback which may then be used when deciding upon further courses of action. According to Eraut (1994) reflection will also help the nurse develop the spontaneous, intuitive performances which are commensurate with the competencies of a professional nurse.

When all five aspects - skill variety, skill identity, skill significance, autonomy and feedback are present Hackman and Oldham (1975) consider that the person's attitude and behaviour towards their job will then result in the positive emotional state indicated by Locke (1976). Hackman and Oldham (ibid.) suggest that when this occurs the individual will experience high internal work motivation, and high satisfaction with work, and there will be a high quality of work performance, low absenteeism and low staff turnover.

It was found in phase two that students perceived much job satisfaction working in areas where primary nursing care was employed. However, the quantitative questionnaire, designed to measure perceived stress of qualified staff, which was employed during phase two, did not give them the opportunity to indicate their level of job satisfaction. Aspects which contributed to the job satisfaction of qualified staff therefore only became apparent during phase three. It was found that qualified staff, similar to student nurses, were not only highly motivated and satisfied when working in the area where primary nursing care was employed, but it was also found staff turnover and the sickness/absentee rate was minimal in this work area. It was clearly identified that much job satisfaction for those working in the primary nursing care area was derived from the individualised patient care approach, and from the
autonomy they were delegated by the area leader. Although at
times staff using this approach to care had a number of
critically ill patients to care for, the delegated autonomy allowed
them to use their discretion as to how to organize their work.
Consequently staff were able to plan and control their workload,
which in turn helped them reduce the actual workload incurred
by caring for the patients. Whilst present findings appear to
suggest that there are positive links between job satisfaction
and decision making at work similar findings were also made
by Alexander et al (1982), Butler and Parsons (1989),

Apart from the delegated autonomy which provided much job
satisfaction, so too did the holistic nature provide the nurse with
opportunities to use various skills, be involved with care from
start to finish and thus see the significance of the care given
within the context of the whole situation. Added to this nurses
were also able to develop close emotional relationships with
patients, which Roberts (1980) and Reed (1988) found
enhanced nurses' job satisfaction. Present findings therefore
confirm the work of Giovanetti (1980) and Perala and Hentinen
(1989) that there is a positive link between job satisfaction and
primary nursing care. Added to this Rodgers and Bond (1996)
found that research findings are more commonly adopted in
practice where autonomous work settings exist.

It would therefore appear that primary nursing care allowed
nurses to put into practice all the aspects mentioned by
Hackman and Oldham (1975). It also provided them with
opportunities to use research based care and encouraged the
nursing staff to form close emotional relationships with clients,
which many nurses regard as the real core of nursing. Primary
nursing care therefore appears to be a method whereby job enrichment for nursing staff could be achieved. The apparent link between job enrichment and job satisfaction was also found by Loher et al (1985) in their meta-analysis of 28 studies which examined the relationship of job characteristics to job satisfaction. Their findings indicate a correlational co-efficient relationship of 0.39 between job satisfaction and all the five dimensions of job characteristics described by Hackman and Oldham (1975). Based on the fact that the correlations between each of the task characteristics ranged from 0.32 (task identity) to 0.46 (autonomy) they argue that job satisfaction could be enhanced through job enrichment, particularly by the delegation of greater autonomy to those in direct client contact.

Whilst present findings suggest there is a positive link between autonomy and job satisfaction, it contradicts those made by Blegan and Mueller (1987) in their study of 370 registered nurses in five acute care hospitals in North America. They found that autonomy at work barely affected job satisfaction of the nursing staff. However this apparent contradiction could be explained by the issue of the employee's need for personal growth and development as addressed by Hackman and Oldham (1975) and later studied by Loher et al (1985). Findings from the latter study suggest a strong positive correlation of 0.68 between job characteristics and job satisfaction for those individuals with a high growth need, whilst there was a correlation of only 0.38 for those with low growth need. Based on these findings Loher et al (1985) argue that the growth need of the individual therefore moderates the relationship between job characteristics and job satisfaction. They suggest that those with high need growth strength will find greater satisfaction the more enriched a job is, whilst those with
low growth need strength require the presence of external situational characteristics. These findings would appear to support the premise that it is the innate nature of the individual which determines the outcome of job characteristics on job satisfaction. Hence, as identified by Dwyer et al (1992) different nurses appear to have differing needs for autonomy.

Malkin (1993), however, suggests that it is not the level of autonomy which provides the job satisfaction, rather it is the source of the satisfaction which accounts for the difference in job satisfaction between those working in primary and non-primary nursing care areas. Findings by Malkin (ibid.) suggest that those working in primary nursing care areas gained much job satisfaction from intrinsic reasons from within the job such as the emotional involvement mentioned by Roberts (1980) and Reed (1988). Malkin (1993) also found that those in non-primary nursing care areas achieved job satisfaction through extrinsic reasons. Although the latter included aspects such as monetary reward, it was found by Firth and Britton (1989) and Blegan (1993) that supervisory support was a key extrinsic source of job satisfaction. (Issues related to supervisory support are discussed later in this chapter.) These findings do however raise an interesting point - do those with high need strength, who will gain job satisfaction from intrinsic reasons, choose to work in areas where primary nursing care is used, or is it the effect of the challenge within this approach to patient care which stimulates the development of high growth need strength? Either way the evidence suggests that both enrichment and enhancement of situational characteristics in the job need to be developed if organisational and employee outcomes are to be achieved.
It was found that these aspects were missing in task-based areas, added to which staff were delegated little or no autonomy and responsibility. If, as suggested by Batey and Lewis (1982), autonomy is the freedom of the individual nurse to exercise self determination and self direction so they can work at an independent level with other professionals, and design total care plans of nursing care for named clients, it was apparent that most nursing staff in task-based work areas were not autonomous individuals. Consequently task-based work did not provide the nurse with any challenge within their job. The result was that nursing staff lacked enthusiasm for work, considered they had heavy workloads, generally perceived much conflict from various sources in their work area, and appeared frustrated and undervalued. In the context of Locke’s mental challenge theory (1976) those working in task-based work areas would, as found, lack job satisfaction. Added to this it was found that task-based work lacked most, if not all, of the aspects mentioned by Hackman and Oldham (1975). It is therefore not surprising that nursing staff working with this pattern of care gained little job satisfaction.

It is however argued by Bucknall and Thomas (1996) that many of the aspects, in particular autonomy, can be present in task-based work approaches. Based on their study of 230 Australian critical care nurses they consider work to be composed of many interlinked tasks which together contribute to job satisfaction. The tasks they listed consisted of many complex, diagnostic, therapeutic, and procedural actions and decisions. Whilst each of these could be viewed as a task they did, in reality, represent a large area of patient care. Within each task there were a variety of decisions which had to be taken by the individual carrying out the care. Bucknall and Thomas (1996) thus argue
that autonomy is embedded within the task, and therefore nurses have both responsibility and job satisfaction within this approach. However the tasks mentioned in the present study were basic, simple procedures, and involved the nurse in very little decision making. Bar very basic nursing decisions all others had to be referred to the area leader, therefore nurses had a very low level of autonomy within their everyday work. The apparent difference between these two concepts of task based nursing could be considered as adding yet a further dimension to the operational definitions mentioned by Thomas and Bond (1990). Although present findings suggest that task-based work does not provide the nurse with job satisfaction it would appear that the term task allocation needs clarification before this approach to nursing is discarded.

Present findings did however suggest that nurses working in task-based areas, unlike their colleagues in primary nursing care areas, had little control over their work and resultant workload. Tasks were allocated to them by the leader, and were carried out by the nursing staff regardless of whether the patient required the allocated care or not. Although Lyth (1988) considers this approach to care reduces the number and variety of decisions which staff have to make and thus anxiety associated with work, in practice it also increased the amount of actual workload. This gave rise to a situation whereby nursing staff were physically exhausted. However the lack of challenge, mentioned earlier in this section, resulted in work being perceived as less threatening and thus qualified staff considered task-based work less stressful. These findings are confirmed by those made in phase two (see Table 16, Page 96). The lack of anxiety associated with task-based work
appeared to encourage the staff to continue using this approach.

In the short term this approach may have enabled staff to meet the immediate challenge associated with work. Although it gave them a sense of achievement and optimism, it did not address the core of the problem. Consequently the amount of workload did not decrease and staff remained physically exhausted. Ultimately this gave rise to a situation where staff became demoralised, and moved to alternative employment. Those who remained attempted to control the effects of the excessive workload either by taking frequent short term uncertificated sick leave, practising absenteeism, or continuing to use task-based approaches to care.

Although various studies have identified a causal relationship between staff turnover and job satisfaction (Price and Mueller 1981; Cavanagh 1992; Wilkinson 1992; Williamson 1993), it was suggested by Hackett (1989) that it is those who lack job satisfaction from organisational factors who have a tendency to seek fulfilment from other sources. Hackett (ibid.) suggests that women in particular tend to find satisfaction from aspects within their home environment. It was apparent by the high staff turnover rate that some staff had moved to more satisfying employment, however others in the same environment were not so fortunate. They remained physically exhausted, frustrated and demoralised. Anecdotal evidence from some participants suggested that the 'home satisfaction route' was taken by a number of these staff. This gave rise to the high level of absenteeism and uncertified short-term sickness which was reported in task-based work areas. However these findings
could have been influenced by the fact that the sample group of qualified staff were all females

To ensure there were sufficient staff on duty to care for patients, a large percentage of bank/agency staff - commonly fifty per cent - were employed on each shift. Whilst numerically this may have provided enough staff to cope with the workload, in practice this was rarely the case. Bank/agency staff, unfamiliar with the environment and specialised nursing, often took longer to fulfil their allotted workload, consequently permanent staff regularly had to help them complete their work. Added to this, bank staff were often reluctant to take on too much responsibility. These combined factors increased both the physical and mental workload of the already over burdened permanent staff yet still further.

In some respects these findings appear to conflict with those of McClure et al (1983) who found that staff turnover was actually reduced in areas where staff worked flexible working hours. There is however one major difference in the approach used in the 'magnet hospitals' which they studied and that in the present study. In the former staff had continuity of employment in the same clinical area, whilst staff in the present study were usually employed in whichever clinical area required extra pairs of hands. Occasionally, when staff in the present study were regularly employed in the same clinical area, it was found that permanent staff came to regard them as 'part timers' and they adopted them as 'one of the team'. As these individuals gained confidence in their area of work, and interpersonal trust between all parties developed, they then relieved the permanent staff of some of their responsibility.
Whilst these three issues - pattern of patient care, workload created by the adopted pattern and the calibre of staff available to carry out care - contributed to the organisation in the work area construct, so too did these variables directly or indirectly affect the atmosphere in the working area. These are discussed in the following section.

Atmosphere in the work area

The atmosphere in the work area was found to be affected by three interrelated aspects - the relationships within the nursing team, personal development and the level of support available from colleagues and supervisors. Of these the most important appeared to be the social support available to individuals.

It has been demonstrated by various researchers (Maslach 1976; Maslach and Jackson 1981; Pines et al 1981; Moos 1986b) that people in health care work, particularly nursing staff, are exposed to many stressors within their job. In fact changes within the NHS of today have increased the throughput of patients, workloads, intensity of ill patients, the need to provide care within a pre-determined budget etc., all of which can be extremely stressful to those concerned in the delivery of the care. However the effects of perceived work related stress of the individual has been found by McWilliam et al (1993), Spencer (1994) and Tyler and Ellison (1994) to be moderated by social support.

Present findings do however suggest that social support, which is described by Hobfoll (1988) as a combination of social integration and supportive interactions, was not available to all staff from within their personal lives. Partners at home did not necessarily enjoy or even find it acceptable to listen to the
problems others perceived at work. Although findings by Tyler and Ellison (1994) suggest those who were married or living with a partner experienced fewer stress symptoms than those with no partner, many nurses are single and, as found in the present study, have limited social support strategies. Added to this many who fall into this category are also newly qualified and experiencing much anxiety in their working day. It is suggested by Chiriboga and Bailey (1986) and Rich and Rich (1987) that it is these individuals who are particularly prone to stress and burnout. It is therefore argued by Wiener (1989) that it is support from within the work place which is required to prevent the stresses of work and home reinforcing each other. As he indicates “if there are no means at the end of the day for letting go of the feelings that have been churned up, then workers end up turning the people they live with into unpaid counsellors” (Wiener 1989 p20). Unless perceived stress is minimized Maslach (1976) suggests there will be a build up of feelings of tension, anxiety and irritability, which may cause the individual to enter a state of chronic stress and eventually burnout.

Studies examining the stress and burnout of nursing staff have been carried out in a variety of work settings. These include army nurses (Constable and Russell 1986), high dependency areas (Tyler and Ellison 1994), caring for demented clients (Kuremyr et al 1994), nurse teachers (Hunter and Houghton 1993) and comparisons between the stress of general nurses and midwives (Wheeler and Riding 1994). Although these studies have been carried out in various nursing environments all reach similar conclusions. Apart from the stressors already mentioned in this chapter (heavy workloads, low autonomy, and pressures within work) these studies indicate that lack of
supervisory support contributes strongly towards the perceived stress associated with work. However findings by Hunter and Houghton (1993) and Wheeler and Riding (1994) suggest that it is the interpersonal support from team and supervisors which help minimise the perceived stress of the nursing staff.

Present findings from the quantitative and qualitative phases also suggest it is interpersonal support which is an important variable for both qualified staff and students. This form of support was found to be available through both the formal and informal groups which existed in the clinical learning environment. Formal groups are considered by Handy (1985) to be those which have been consciously created by the organisation in order to accomplish its collective purpose, whilst informal groups are those which have spontaneously developed among people who work together. Although present findings suggest that interpersonal support through the formal groups was usually in the form of supervisory support (ie preceptorship and mentorship routes), it was the support obtained through the informal groups which appeared to have the most impact for the nursing staff.

Within the informal group, where development of relationships was not constrained by hierarchical roles, opportunities existed for alliances to be cultivated. Whilst these provided the individual with the three forms of support mentioned by Thoits (1986) - actual, informational and emotional - it appeared to be the social integration mentioned by Hobfoll (1988) which created the most job contentment. Whilst similar findings have also been made by Dixon and Shaw (1986) in their study among NHS trainee administrators, they also found that females in particular need to belong to cohesive groups. This
finding would appear to be important in the mainly female dominated general nursing profession. Lack of cohesion within the working team could account for the increase in absenteeism in areas where this did not occur. In fact findings by Firth and Britton (1989) suggest that lack of support for staff correlates positively with sickness in excess of four days.

The need to be integrated into, and accepted as ‘one of the team’, was found to be a particularly important issue for students, who regularly changed their work areas in order to achieve the competencies required of a registered nurse. It was found that students perceived much anxiety when adapting to new wards. Whilst Parkes (1982) and Pagana (1988) found this was due to fears of failure and insecurity about professional competence, present findings suggest it arose from the fear of ‘not getting on’ with the staff in the clinical area. If, as found by West and Rushton (1986) there was any apparent ‘them and us’ approach, it led to a strained atmosphere between the students and staff, and students then did not perceive the area as supportive as it could or should be.

In clinical learning environments where there was good interpersonal support from qualified staff, both at the formal and informal levels, students found they quickly adapted to the new environment. Qualified staff in such areas were found to be willing to listen to students, answer their questions, clarify issues which concerned the student, and generally included them as a valuable member of the team. Findings by Flagler et al (1988) suggest that it is the personal interest from the nursing staff which helps increase the self-confidence level of the student. Similar to the findings made by Lewin and Leach (1982) and Smith (1988) it appears that students consider the
best learning areas are those where staff are approachable and friendly, and students feel they are integrated into the team. In fact Nail and Singleton (1983) found that the actual amount of learning which took place in the clinical area was directly proportional to the extent which personnel in the environment accepted the student.

In some clinical learning areas it was found that students lacked social interaction and support from the qualified staff. This caused students to feel there was a lack of empathy and respect for them, and they did not feel one of the nursing team. Similar findings by Hinshaw et al (1987), and Kavanagh (1989), suggest that individuals working in such areas will experience a lack of job satisfaction and an increase in emotional exhaustion. Added to this, present findings indicate that the lack of, or negative, interpersonal supervisory support left students feeling anxious, lonely and devalued. Students just wanted to complete their clinical allocation as soon as possible, and many indicated they would not want to return there once qualified. Although none of the students in the present qualitative study left nursing (or as far as I am aware were even considering it) inadequate support, and the stress created by interpersonal relationships at work, were found by Lindop (1989) and Lees and Ellis (1990) to be the main reasons why students left nursing during their training. It would therefore appear that an important need of students is to be socially integrated into, and supported by, those working in the clinical learning environment.

Nursing staff of all grades are exposed to many stressors in their working areas, and thus they too need social support from formal and informal sources to help them cope. Ross and
Mirowsky (1989) do however suggest that whilst social support can help boost the self-confidence of the individual and thus encourage them to cope actively with their problems, so too can social support detract the individual from using problem-solving approaches. It was clear though that staff working in task-based areas had neither control or social support from supervisor nor colleagues.

The main reason for the latter appeared to be due to the high turnover of staff in task-based work areas. If, as suggested by Nelson-Jones (1990), social support demands a level of involvement and concern, it requires the development of trusting relationships whereby individuals feel safe to disclose their vulnerability and strengths. Trust building is however a subtle, complex and often lengthy process. Consequently staff working in task-based areas, where there was a high turnover of staff, had few opportunities to develop and consolidate relationships with colleagues. Added to this the high percentage of transient staff employed, resulted in a situation where permanent staff rarely worked together on the same shift patterns, which reduced still further any chance of developing trusting relationships.

It is argued by McCloskey (1990) that job contentment is the result of a combination of autonomy in work, and social integration. Whilst those with high growth need strength (as indicated by Loher et al 1985) may gain satisfaction and contentment from the intrinsic aspect of autonomy, those with low growth need strength require extrinsic factors and may thus benefit from high social support. It was apparent though that staff working in task-based work areas lacked these aspects and were exposed to both low social support and a low sense
of control within their work area. This would suggest that neither those with high or low growth strength need would gain job satisfaction and contentment in task-based areas of patient care.

Added to this low social support and a low sense of control may, according to Lazarus and Folkman (1984), result in an increase in perceived anxiety. In an attempt to reduce this anxiety the use of task-based work may be perpetuated as, according to Lyth (1988) it reduces the number of work-related decisions which staff have to make, and thus by implication reduces the associated anxiety. Whilst the low social support and sense of control may have led to the continued use of task-based work, it would also appear that the combination of these two aspects may, similar to findings made by Ross and Mirowsky (1989), be the reason why staff in task-based work areas were depressed and despondent. It could therefore be argued that whilst low social support and a low sense of control within work may have increased the apparent stress associated with the job, the task-based nature of the work approach moderated any resultant anxiety. Hence a self-perpetuating spiral of events was set up.

Whilst it has been argued that social support and social integration are important for individual group members, Berry and Houston (1993) contend that so too is it important for the organisation. It is now more than forty years since Homans (1951) put forward his theory of work group behaviour, in which he stresses the influence which informal groups have on the overall behaviour of the organisation and thus the development and maintenance of a quality working environment. Within this model there are three main aspects which affect the emergent
behaviour of employees (see Figure 7). Firstly are the motives which determine the reason why an individual joins an

![Figure 7 Model of Work Group Behaviour (Based on Homans (1951))](image)

organisation (these include job design, economic reward, physical conditions etc). Secondly are those activities in which the group engages (i.e., the job itself). The third aspect which affects worker behaviour is the social structure of the groups which have spontaneously emerged from interaction of members of the informal organisation.

Whilst the interactive effect between these three aspects is considered by Homans (1951) to affect the productivity of the organisation, the development of the individual, and their perceived job satisfaction, he stresses that it is the informal
groups and the individuals within those groups which have the
greatest overall impact on the development and maintenance of a quality working environment.

If the organisation is to ultimately achieve customer satisfaction, McCalman and Paton (1992) argue that there is a strong need to ensure the establishment has motivated staff. Silber (1981) suggests that the motivation of the individual is directly and positively proportional to the degree of association one feels for the job, and is reliant on the presence of the "3B's (to belong, to be and to become)" (Silber 1981 p46).

Apart from the issues of support and development of relationships (which encompass the belongingness mentioned by Silber 1981), and that of autonomy discussed in the last section (which is the 'to be' aspect), the need 'to become' was included by staff when they indicated their desire for personal development. All grades of staff wanted to be treated as individuals with their own special development needs. Whilst some staff wanted the opportunity to undertake further academic study, it was found that others, including students, preferred to develop their skills within the clinical environment.

Principles of care learned in the classroom may be theoretically appropriate, but Eraut (1994) suggests they can be difficult to apply when the nurse is faced with uncertain, unique, messy indeterminate, divergent situations as found in the clinical situation. Consequently it was not surprising that a number of nurses (qualified and student) considered there was a large gap between their knowledge and the competencies required of them in the clinical setting. To overcome this theory-practice gap it was found that qualified staff and students enjoyed the
opportunity to build on their repertoire of skills and understanding, and apply the knowledge they had learned to the practical situation. Unless nurses have the chance to develop their skills they will not become proficient in nursing.

It was envisaged by Benner (1984) that proficiency in nursing will only develop as the nurse moves through the five stages which she outlined - novice, advanced beginner, competent, proficient and finally expert. During these stages abstract principles and paradigms learned in the classroom are exchanged for concrete experiences. Hence apparently disjointed tasks become part of a complex whole as the individual moves from a detached observer role to that of an involved performer. Although within each stage the nurse should be able to develop a level of tacit understanding, this according to Schon (1991) is dependent on their having the opportunity to use reflective approaches in their work.

Reflective practice is considered by Schon (ibid.) to encourage the individual to reflect upon actions undertaken in their work, the outcome of those actions and the knowledge implied in those actions. Schon (ibid.) suggests that the development of reflective practice takes place at three levels. Initially the individual, at the novice/advanced beginner stages described by Benner (1984), learns to apply the standard rules and facts. As the nurse gains confidence they start to reason from general rules to problematic cases. Finally the individual learns to develop and test new forms of actions and understanding. At this stage they have reached Benner's expert stage, whereby they no longer rely on rules and guidelines, but have an intuitive grasp of situations based on deep tacit understanding.
Present findings suggest that reflective practice was greatly enhanced when problem solving and holistic approaches to work, as found in primary nursing care, were the norm. Nurses had the opportunity not only to reflect upon actions whilst they were carrying out individualistic care for clients, but to use their autonomy to alter the care if required. Later, in discussion with their mentor/preceptor, the nurse theoretically examined the multiple interrelated tasks which they had undertaken, and discussed alternative courses of action which could have been employed.

The use of reflective approaches in task-based work areas was, by implication, very limited. The approach did not provide an holistic overview of the patient or the treatment and nursing care which had been carried out. Reflection was limited to the tasks undertaken by the nurse. Qualified staff and students did not consider they were using their skills to the full and many of them became discontented and disillusioned. A number of the qualified staff talked about leaving if the opportunity arose.

Whether nurses wanted to develop their skills in the clinical situation or attend courses their overriding need was for them to have the support of their supervisor. When this was forthcoming staff appeared to be more motivated and have more job satisfaction. Various studies (Stone et al 1984; Duxbury et al 1984; Kiely 1986; Firth and Britton 1989; Blegan 1993) suggest that, apart from the aforementioned increase in job satisfaction, supervisory support results in greater personal accomplishment, and a reduction in emotional exhaustion of the staff.
Present findings suggest that in areas where discretionary supervisory support was available (area leader for senior qualified staff, preceptor for newly qualified nursing staff, and mentor for students) staff and students did not perceive themselves unduly stressed. In clinical areas where there was a lack of supervisory support there was also evidence of high staff turnover, reported high absentee/short term sickness rates, and staff and students were found to be dissatisfied with their job. Although Hart and Rotem (1995) found a link between staff dissatisfaction with personal development and a high staff turnover rate, Gilloran et al (1994) discovered that lack of job satisfaction was significantly higher ($p<0.01$) among staff nurses ($N=236$) than among other grades of nursing staff ($N=1400$). If, as found by Ogier and Barnett (1986) students rely mostly on staff nurses for support and guidance, this finding by Gilloran et al (ibid.) gives cause for much concern. Although Hart and Rotem (1995) also found that there was a strong positive correlation between the professional development of staff nurses and organisational support for learning, they do admit that it was difficult to separate organisational support for learning from other environmental factors which were also conducive to learning. Despite this their findings suggest that there is a positive link between organisational support for learning, an appropriate balance between autonomy and supervision, and good social support. Areas where these were present were regarded by the nursing staff as good learning environments. It would therefore appear that work enhancement, including professional development, organisational support, autonomy for staff nurses, and social support should be available for staff nurses if they are to fulfill their role as mentor and role model for student nurses.
Mentors, according to the ENB (1988), are suitably experienced first level practitioners whose role is to assist the student achieve the knowledge, skills and attitudes required of a registered nurse. It was found that it was staff nurses, rather than ward sisters, who usually acted as mentors for student nurses. Based on the previously mentioned findings of Ogier and Barnett (1986) that students mostly rely on staff nurses for support and professional relationships, this would appear to be an appropriate arrangement. Although it was envisaged by the ENB that mentors should not undertake assessment of students, present findings and those of Brereton (1995) indicate that, in practice, this does occur.

Mentors are thus trying to combine the need to provide quality care and management of patients, with that of acting as mentor and assessor for students. At times it was found that these dual roles caused conflict for the staff nurse, which led to feelings of frustration, guilt, and a failure to fulfill either role successfully. According to Fox (1991) this blend may ultimately reduce feelings of self-worth, and in the presence of other stressors - lack of autonomy, heavy workloads, lack of social support - may lead to extreme stress and burnout for the mentor. As identified earlier individuals experiencing extreme stress may then act in a depersonalised manner to those with whom they are in contact - colleagues, students, patients and relatives. Mentors play an important role in the socialisation and professionalisation of student nurses. It would therefore appear to be extremely important for student nurses and the future of the nursing profession that stress in qualified staff is maintained at an acceptable level. It is therefore the responsibility of all those concerned with the clinical learning environment to ensure this occurs.
6.16 Summary of findings from phase three

At the beginning of the study it was hypothesised that student satisfaction with the clinical learning environment would be greatest in areas where perceived stress of qualified staff was lowest. Whilst the findings from the previous phases of the study suggest there are many variables which directly affect the relationship between the perceived stress in qualified staff and the perceived satisfaction of students, nurses findings from the present phase identified two constructs - “organisation of the working environment” and “atmosphere in the work area”. The effect of the categories within each of these identified constructs determined how qualified staff and students perceived the clinical working area.

Positively perceived clinical environments employed a pattern of patient care which enabled staff to provide an individualistic and holistic approach for clients. Apart from the fact this approach encouraged continuity of nurse-patient relationships, so too did it require staff to be delegated autonomy, accountability and responsibility for the care prescribed. Consequently nurses were able to determine their own workloads and adjust them according to the demands of their patients. Staff enjoyed working in this area, thus staff turnover was minimal and few bank staff were employed. Opportunities therefore existed for staff to form strong interpersonal relationships, and thus strong social support strategies. Personal development was encouraged by the area leader across all grades of nursing staff.

Negatively perceived areas were those where all nursing activities were strictly controlled by the area leader who, by the use of a task-based approach to patient care, delegated little or
no autonomy, responsibility, accountability or decision making to most of the nursing staff. Lack of these aspects within the job caused a number of staff to resign. To compensate for the reduction in staffing numbers a variety of bank and agency staff were employed. Often as many as fifty per cent of the total number of nurses on duty were transient individuals. This created difficulty for the staff to form good interpersonal working relationships with other members of the nursing team, consequently social support among staff was lacking. Added to this personal development both within work and through courses was not encouraged by the area leader.

It was therefore apparent that the fundamental aspect which governed the outcomes from the identified constructs of “atmosphere in the work area” and “organisation of the working environment” and, in turn determined whether staff perceived the clinical area as positive or negative in terms of job satisfaction, was that of the style of leadership employed in the clinical environment. In the positively perceived area the leader delegated autonomy to the nursing staff and encouraged them to be involved in all activities within the clinical area. Conversely in areas perceived negatively by staff the leader delegated little autonomy to either qualified nurses or learners and instead maintained control over all the activities within the clinical area. Based on terminology introduced by Likert (1961) I have described these two identified styles of leadership as participative and authoritarian respectively.

As the link between the two previously identified constructs - “atmosphere in the work area” and the “organisation of the working environment” - was that of the style of leadership employed within the clinical environment, I felt that the latter
was "the central phenomenon around which all the other categories are integrated" (Strauss and Corbin p116). I therefore decided it was the core construct. Based on the findings from this phase of the study an overview of the proposed theory is given in Figure 8.

![Figure 8: Effect of Leadership Style on identified constructs and categories](image)

The reasons why the area leaders may have adopted a particular style of leadership were not identified, but the importance of the core construct is such that the whole of the next chapter has been dedicated to exploring theoretical issues related to leadership styles.
7.1 Introduction
The findings of this study have shown that two distinct styles of leadership - authoritarian, and participative - were employed in the two units studied. Authoritarian leaders appeared to use a style similar to the exploitive autocratic leadership style described by Likert (1961). In these clinical areas the leader did not appear to trust individuals, imposed decisions on them, rarely delegated responsibility and attempted to motivate them by the use of threats. There were low levels of team cohesion and generally poor communication skills between leader and staff. The authoritarian style had a tendency to result in task-based approaches to care which resulted in excessive workloads, increased turnover of staff, and increased employment of bank staff. Staff felt they lacked support, team cohesion and personal development. This style of leadership, which was employed within two of the areas studied, appeared to be disliked by most of the staff.

Leaders using a participative style, similar to that identified by Likert (1961), trusted and paid attention to the needs of employees and the organisation, and treated employees as equals. Apart from having complete trust in employees the leader also showed they had confidence in the nursing staff, allowed them autonomy to make decisions for themselves (albeit the staff were required to refer some matters to the leader), motivated by reward, and set goals by participating with members of the team. Within the democratic style
described by Likert (ibid.) the leader allows employees complete autonomy for decision making. However, within the complex organisation of the health service, this is not always feasible, therefore it was accepted that the style of leadership used in the departmental area combined aspects of participative and democratic styles.

Findings by Likert (1961) implied that employees, in general, prefer a style of leadership where the leader is 'people orientated' rather than 'task orientated'. However, it is argued by Huczynski and Buchanan (1991) that employees do not like a participative style of leadership which allows them too much freedom. Often known as 'laissez-faire' this style of leadership allows the group almost total control of decision making. Although this permits the team members to act independently and express their ideas, it can result in the group lacking control and thus direction towards achieving the organisational objectives. Ultimately chaos and inefficiency may result.

Findings suggest that staff preferred the participative style as they perceived the primary nursing care approach to patient care allowed them autonomy (control over their work), yet they felt supported. Staff were able to keep their workloads within an acceptable level, there was a low staff turnover rate, interpersonal relationships among all grades of staff were encouraged, and ultimately a strong cohesive, and supportive team had resulted. Within such a working environment staff and students felt able to pursue their own personal career development. The identification that staff appeared to prefer the participative style complements findings by Likert (1961) and Boumans and Landeweerd (1993) which suggest that the most effective leaders are those who adopt this style. However, as
Huczynski and Buchanan (1991) indicate a leader can only lead if there are followers willing to follow.

According to McCalman and Paton (1992) if an organization is to be successful, the emphasis should not rest solely on meeting the needs of the individual clients, but should also meet those of all its workers - including managers and leaders. They argue that success for an organization comes from satisfied customers generated by motivated people. However, the ever changing competitive market of the present day NHS also requires the organisation to be composed of employees who feel committed, are able to act in a flexible manner, and are prepared to accommodate new methods of work practice. Alongside this social and technological changes are producing a work force who will potentially resist old styles of management (ie autocratic and authoritarian approaches). As Slater and Packard (1992) indicate employees of today prefer to contribute and agree not obey.

If nurses in the clinical environment are truly to empower the individual client, maximise the person’s independence and minimize their dependence, nurses need sufficient autonomy to allow the patient to make their own decisions. Unless the style of leadership within the clinical environment permits this approach then the opportunity for the patient to be empowered is not likely to occur. The legacy, left over from the industrial revolution, of treating employees purely for their economic value, can surely no longer apply if a committed, flexible workforce is to be achieved. Thus old values of management with their traditional authoritarian, hierarchical structures are becoming less relevant in the present working climate.
Student nurses are taught in the academic environment that nursing care should be individualised and that patients should be given sufficient information for them to make autonomous decisions about their health and care. However when students are working in their allocated clinical areas they have to comply with the patterns of care utilised in the area. Although encouraged to empower patients students may find that the style of leadership and the resultant pattern of care is such that they cannot utilise this approach to patient care.

It is therefore apparent that changes occurring within society and in nurse education, require a style of leadership which empowers the individual employee, provides a supportive environment to enable individuals to do their jobs effectively, and encourages the individual to maximise their potential. The clinical area leader therefore needs to develop organizational practices which produce both quality and cost-effective patient care, and provide a working environment for the staff which is conducive to producing these outcomes. Whilst primary nursing care, as opposed to task-based nursing, was found in the present study to provide much job satisfaction and contentment for nursing staff, it appears from studies (indicated below) that primary nursing care also provides a higher standard of nursing care than team or task-based nursing. Studies by Hamera and O’Connell (1981), Sellick et al (1983), Reed (1988) Duxbury (1994), and Thomas (1994) suggest that primary nursing care is associated with more nurturance of patients, increased direct patient care, increased interpersonal patient-nurse relationships, and generally greater involvement of the patient in their care than that provided by team or functional task-based approaches. It would therefore appear that a participative style of leadership, which encourages the use of
individualistic and holistic care for clients, may be the most appropriate path for a leader to follow if they are to achieve both a high standard of patient care, and motivated, committed, caring staff.

However there are several reasons why a particular style of leadership may or may not be employed. These appear to be determined not only by the level of control desired by the leader, but also by the needs of the followers. These aspects are discussed in the following sections.

7.2 Control and interpersonal relationships
According to Fielder's contingency theory (1981) the level of control which a leader can actually utilise is dependent on the quality of relationships between that individual and their followers. Where (as identified in the departmental area), there were highly cohesive and relatively conflict free relationships among all members of the staff, the leader was able to delegate yet still retain a level of control which was acceptable to the workers. The leader was able to exert control knowing that group members were supportive and loyal. Thus, suggestions and requests from the leader were heeded without the leader appearing to exert control. However, where relationships between leader and team are poor, Fiedler (1981) suggests that control by the leader can still be achieved, providing work of employees is carried out in a task format. A highly structured task-based approach to care had been adopted by the specialist areas, and control was firmly embedded in the role of the leader. Application of Fiedler's leadership theory (ibid.) suggests that this approach was employed either because relationships between followers and
leader were poor, or because the leader wished to retain control. Unfortunately the level of control which was embedded within the task-based approach resulted in staff feeling undervalued, lacking challenges in their work, and feeling that the leader did not trust them. Consequently, there was further deterioration in interpersonal relationships between the staff and the ward leader. According to findings by Gilloran et al (1994) staff are then inclined to develop a negative view of the Charge Nurse's ability to lead.

In order to maintain control the leader continues to utilize a task-based approach to patient care. However, the lack of autonomy for the staff, which is encompassed within this style was found by Dick (1992) to be strongly associated with an increase in stress and burnout for the staff. Haynes and Jackson (1995) consider that the accepted relationship between the behavioural style of the supervisor and the mental well-being of employees is not always clear. An on-going study by Haynes (1996) is thus focused on the change which employee feedback may produce in a first line/middle supervisors in the NHS.

Although findings in phase two suggested that staff in the specialist areas did not perceive themselves as unduly stressed, it was identified by students and staff in phase three that they used many routines/rituals in their nursing care. It is possible that staff in these areas were using various automatized behavioural patterns/rituals in an attempt to achieve some form of control within their work setting, whilst minimising the physical and psychological effort associated with it. If this were so it could explain the apparent lack of stress perceived by staff in the specialist areas.
7.3 Control and/or social support

According to Lazarus and Folkman (1984) emotional well-being for an individual is the result of a feeling of control over their own life combined with a perception of support. It is argued by Attridge and Callahan (1989) that self-efficacy (which is derived from the perceived level of control the individual has over work) encourages active problem-solving and results in the individual feeling they are coping well with the situation. However within the ever changing clinical environment, where the leader is expected to plan for the future as well as manage the present situation, it is doubtful if any of the area leaders could feel totally in control. Ross and Mirowsky (1989) found that the emotional well-being of the individual could be maintained even when there was a perceived lack of personal control, providing the individual perceived a compensatory level of social support, Thoits (1986) suggested that although social support can be provided in three main ways - actual (physical), informational, and emotional - it is emotional support which is required when an individual considers they are not in control of a situation. This is supported by the present findings in which nurses indicate that they prefer to talk to other nurses about work related problems. This raises the question as to how the area leader copes with their problems.

Due to changes brought about by the Griffiths Report (1983) and those from Working for Patients (Dept. of Health 1989) a major metamorphosis has taken place in the role of the ward sister. Not only has the title changed to that of ward leader/area leader, but increased managerial responsibilities are now encompassed within the job description. Quality control, accountability, budgeting and cost containment are now common words in the vocabulary of the area leader. Some
training in respect of these issues was given to those sisters/leaders who came into post after the introduction of the changes. Those who were already in post at the time changes were introduced were mainly expected to assimilate the new ideas and concepts with minimal instruction. Many of the changes caused an increase in workload, which has already been identified as a major stressor to those in nursing.

Added to this is the fact that the area leader now occupies a relatively unique position within the hospital hierarchical system. He or she heads up a nursing team, is professionally responsible and accountable for the care of patients and staff on the ward, yet is also considered subordinate by various managerial grades within the hospital setting. As such, the leader occupies a cross-cultural role as the most senior nurse in the clinical area, yet the most junior of the managerial grades. According to Handy (1985) individuals who occupy such a role are those most likely to experience much role stress. Under these circumstances Ross and Mirowsky (1989) found that individuals need a high level of social support.

Smith (1988) found that nursing can be extremely emotional work, therefore nurses of all grades, including the area leader, need adequate emotional support where they can talk out their fears and feelings in a supportive environment. In the past, ward and departmental leaders were able to receive social support from the Nursing Officer grade, a post later replaced by senior 'H' grade Sisters. However the immediate supervisor for the ‘G’ grade area leader is now the unit manager, who does not necessarily have any nursing experience. Although a non-nurse unit manager may be able to provide actual and informational support for the area leader, it is questionable...
whether they are able to provide the sort of emotional support required by an individual caring for critically ill patients. Whilst present findings suggest that nurses prefer to talk to other nurses about work related problems the area leader may, as supervisor to those in nursing team, consider it is not appropriate to seek emotional support from these individuals.

Added to this there had, during the survey and interview phases of this study, been six acting unit managers over a period of two years within the specialist unit. According to Arnold and Boggs (1989) trusting relationships take a long time to develop. Therefore even if the area leaders had sought emotional support from the unit manager it is doubtful if sufficient trust would have been well developed in the short periods of time the managers were in post. Potentially little emotional support was available for the leaders in the specialist areas. In contrast the departmental leader had continuity of unit manager throughout the period of this study, and by implication would have had the opportunity to develop and receive some social support. Based on the findings of Ross and Mirowsky (1989) that compensatory support reduces the requirement of control, the presence of support could have been the underlying reason why the leader in the departmental area could reduce their level of control and use a more participative approach. Conversely the findings of Ross and Mirowsky (1989) suggested that when social support was low, control over the task had to be increased in order to avoid psychological distress. It would therefore appear that it was the apparent absence of social support which may have caused the specialist area leaders to adopt an authoritarian style of leadership, in an attempt to control and thus minimise the stress and distress associated with the role.
7.4 Control as power
It was suggested by Handy (1985) that the participative approach, with its delegation of responsibility to followers can leave the leader "feeling naked and a little lonely" (p328). Handy (ibid.) therefore considered that the authoritarian approach may be adopted in order to provide the individual with a feeling of ownership. It is also argued by Attridge and Callahan (1989) that an authoritarian style of leadership is employed by some individuals, to emphasise to other people in the organization the amount of power they are able to exert over others. The resultant apparent efficiency of the working area, is considered by Attridge and Callahan (ibid.) to be admired by managerial staff and thus the self-esteem of the leader is increased.

Regardless of the reason for employment of the authoritarian leadership the result was the same. Staff and students in the specialist areas strongly disliked the authoritarian approach, but they seemed scared to challenge the authority of the leader, and a state of compliance appeared to have developed. Makin et al (1989) suggest that although staff compliance in the short term can enable the leader to resolve conflict within the working environment, ultimately it will lead to a situation of "organizational guerilla war" (Makin et al 1989 p 117) and staff may exert negative power.

According to Handy (1985) negative power is "the capacity to stop things happening, to delay or to distort them" (p127). Comments from staff in the authoritarian leadership driven specialist areas indicated that negative power was often used during the working day. In the absence of the area leader they often failed to carry out procedures the way the leader wanted
them done, and they also changed the usual ways of working. These occurrences were not approved of by the leader which resulted in this individual loosing trust in the staff, and thus introducing various checking procedures. Staff continued to employ negative power by not adhering to the newly introduced procedures, which resulted in further deterioration in interpersonal relationships between themselves and the area leader. Findings by West and Rushton (1986) and those of the present study indicate that nurses working in rule bound and restrictive areas become frustrated and disillusioned. Both studies found that the resultant lack of autonomy and responsibility for the staff led to low morale, stress and a general state of discontent. Staff experiencing similar negative emotional states were also found by Firth et al (1986) to show less respect to those subordinate to them (ie student nurses).

Student nurses were, in some clinical areas, directly exposed to authoritarian leadership, as well as the effect this style of leadership style had on the qualified staff working in that area. According to Wiener (1989) stress within a working team can be very contagious, therefore it is not surprising that students in the specialist clinical learning areas were also stressed and disillusioned. It is therefore speculated that it was either contagion of stress within the nursing team, or the direct and/or indirect effect of the leadership style on the student, which caused students to view the specialist areas so negatively.
7.5 Group needs which influence the style of leadership which can be adopted.

Earlier in this chapter it was suggested that the leadership style is dependent on the relationship which the leader has with members of the team. However it is suggested by Hersey and Blanchard (1982) that it is the level of team cohesion which actually determines the style of leadership which can be adopted. According to Hersey and Blanchard (1982) newly formed teams, who have not developed trusting relationships between each other, work most effectively with a high task/low relationship leader. As trust and confidence among all parties develop, and colleagues and leader become more aware of the technical and psychological ability of the team members, the leader can adopt a high task/high relationship style. Still later the leader can reduce the emphasis on the task so that a high relationship/low task style is achieved. Therefore the style of leadership which can be adopted is determined by the team members rather than a direct choice of the leader.

Within the specialist unit a number of staff had left, and a high percentage of Bank/Agency staff were employed on each shift. The permanent group members of these two areas were therefore part of an ever changing team, which meant that they were constantly forming new groups. Trusting relationships between members of the team and the leader were potentially unable to be developed and thus the utilization of a high task/low relationship style of leadership had to be utilized if the leader was to maintain control and thus cope with the situation.

Although the high task/low relationship style may be appropriate for use with new group members, it was not acceptable to other permanent qualified staff members. The
low level of decision-making autonomy associated with the high task control and low relationship style, caused much frustration and dissatisfaction to some of the qualified staff (particularly those more recently trained). This had resulted in a number of them having already left the job or at least considering it. There was an increase in the short term sickness rate, which was also found by Boumans and Landeweerd (1993) to be associated with an authoritarian leadership style. The increased staff turnover and increased sickness resulted in the employment of some new staff or even more bank staff.

This self-perpetuating downward spiral of events resulted in continued employment of this style of leadership as cohesion of the group was never able to develop. Consequently, these areas appeared to be stuck in a pathological state. Although a certain level of staff turnover is acceptable within any organisation, Berry and Houston (1993) consider, it becomes dysfunctional when good performers quit.

Therefore employment of an authoritarian style of leadership could prove to be costly to the organisation as new people need to be trained/orientated, and it takes time before the new employee reaches an acceptable stage of performance. During this time the quality of nursing care may not achieve the standard required of the organisation. Re-formation of the team also has to take place to accommodate the new employee, and as indicated above this can cause a reduction in team cohesion, and ultimately the employment of a high task/low relationship style of leadership.

Unless opportunities exist for staff to develop interpersonal relationships and thus interpersonal trust with other members of
the nursing team there will be a tendency for the area leader to adopt the high task/low relationship style of leadership suggested by Hersey and Blanchard (1982). The present system of employing a small core of permanent staff and a larger number of transient staff appears to be one of the causes for the employment of a task-based authoritarian approach. The findings of this study indicate that staff do not like this style of leadership, and there is an increased tendency for staff to leave or at least start actively looking for alternative employment. Thus, a vicious cycle of events is set in motion.

In the departmental unit where there was a minimal turnover of staff, only a small percentage of bank staff needed to be employed on any one shift. Consequently, individuals within the team managed to develop good interpersonal relationships. The development of these was further encouraged by the area leader both within and without of work. The development of trust between the staff and between the leader and staff may be the reason why a highly participative and low task pattern of patient care was able to be utilized. These findings appear to confirm work by Longest (1990) that highly trained individuals (as qualified nurses are) prefer a participative/democratic style. Although the employment of a democratic style could be viewed as eroding the leaders ability to make decisions Longest (ibid.) found that in practice the demonstration of trust and confidence which the leader had in the staff enabled the former to exert further influence rather than less.

It therefore appears that there are two main aspects which determine the style of leadership which is ultimately adopted. Firstly are those which originate directly from the leader. These include the social support which is available to them, and
whether they are prepared to use it; their relationships with members of the nursing team; and the level of control and power which they desire or need. Secondly are those which relate directly to the needs of the group. However if the style of leadership which is employed can potentially be determined by the followers, to what extent can the managerial team affect the decision of the area leader as to which style to adopt?

7.6 Influences of middle and senior management which may affect the style of leadership adopted by the area leader.

Although the area leader may trust the nursing staff and tolerate their misjudgements, it was suggested by Handy (1985) that these may not be tolerated by the leader's unit manager (i.e. middle manager). According to Huczynski and Buchanan (1991) many middle managers still regard authority as implicit within their job title. They use an authoritarian approach and expect their first line managers to do likewise.

The authoritarian role of those in senior and middle management is highlighted by the traditional organisational structure found within many establishments, particularly those in health care. The hierarchical pyramidal structure (see Figure 9) creates the impression that senior management occupies the highest level and is therefore in a position to dictate whatever changes they feel are correct for the organisation. This organisational structure tends to result in employees viewing any manager as superior to them, and they in turn may consider themselves superior to patients.
The unit manager may also consider that the nursing team lacks maturity for self-control. Consequently, the unit manager will not relinquish their control over the activities undertaken by the area leader and the nursing team. However Handy (1985) suggests that as trust and confidence between a manager and area leader develops the style of management should become more congruent for both parties. When this occurs Handy (1985) considers that true delegation, and thus effective delegation is possible. However, even if a trusting relationship has developed, the manager may prefer not to delegate responsibility to the leader, but to maintain an authoritarian management style. The amount of trust which the area leader can extend to the nursing team may therefore not be a direct result of their leadership style and approachability, but may be attributed to the amount of trust and support given to them by the unit manager.

It is interesting to note that in the departmental area, where there had been continuity of manager over a three year period
of time, delegation of responsibility occurred, yet in the specialist area where there had been six managers in two years delegation of responsibility did not occur. It could therefore be conjectured that the lack of continuity of manager prevented a good trusting relationship from developing between the area leader and the manager. In turn this contributed to the development and maintenance of an authoritarian approach, which led the area leader to do likewise. The lack of quality interpersonal relationships, created by the above scenario, also reduced the level of support available for the area leader. Although Fong (1990) found that perceived lack of support can result in a situation of burnout, Handy (1985) considers that minimization of its effects can be achieved by the development of "stability zones". These are commonly established by the use of routines and rituals, and are compatible with Fiedler's (1981) control theory. It could therefore be conjectured that the routines and rituals employed by the specialist areas resulted from lack of support from their unit manager.

In an attempt to streamline and thus achieve a cost-effective organisation, many companies are, in the present economic climate, either redeploying or making various managers redundant, this action being most obvious among those in middle management. Managerial changes, which create feelings of lack of job security, are regarded as a threat by those who may be involved. It is argued by Huczynski and Buchanan (1991) that feelings of job insecurity may therefore be sufficient to persuade a middle manager to comply with their immediate manager, and thus utilise a style of management preferred by this more senior individual. This action by middle managers is noted by Huczynski and Buchanan (1991) to be
most evident among those who do not wish to block their own promotion chances.

Reorganisation of managerial staff within NHS hospitals has resulted in a loss of many of the 'H' grade senior nursing posts. Incumbents of these jobs were either granted early retirement or redeployment in clinical areas. Job descriptions for the newly created posts were such as to exclude many nurses. Therefore, a number of non-nursing middle managers now exist. These individuals are on the 'bottom rung of the managerial ladder', and will not wish to jeopardise their chances of promotion, therefore, they will be more inclined to use a style of management acceptable to their manager. Consequently, a direct result of the style of leadership used by a senior manager towards middle managers may result in those in the clinical environment having insufficient responsibility delegated to them by their middle manager.

Some senior nurses do however remain in middle managerial posts, despite the fact that many lack business experience and are ill-prepared for this role. Most of these individuals are potentially in the most senior position they will achieve, and will therefore not be seeking further promotion. It could therefore be assumed that the need to comply with their manager is less imperative, and they will be more inclined to delegate to the clinical staff. However, the lack of preparation for the new role may be such that they are ineffective in the job, and thus cling to the security of an authoritarian approach. The fear of redundancy may also encourage the nurse manager to comply with senior management, and thus adopt a style of leadership acceptable to those in more senior positions.
Although the style of leadership which is employed within a clinical environment is potentially determined by a variety of factors, the adopted style affects both the organisation and the atmosphere of the working environment (see Figure 10).

As the empowerment of staff is ultimately dependent on the style of leadership, any increase in managerial control, deprives employees of the opportunity of participating in the
important decisions which affect their working lives and those of the clients. Within the competitive world in which each trust hospital exists it is essential for the organisation to be responsive to the needs of its customers as well as achieve a cost-effective, yet high quality service. To achieve these outcomes employees need to be committed and flexible in their approach but, as Peters (1987) argues, this outcome will only be achieved by a leader who cultivates attitudes towards employees which balance objectivity with empathy. Although Adair (1990) suggests that area leaders need to concentrate on team building, development of direction and creativity, findings of the present study indicate that area leaders also need to delegate responsibility to staff, and encourage a participative approach.

Present findings indicate that it is the lack of participation in decision making which causes staff much frustration and stress. Thus area leaders need to change the managerial perception of their role so that they become facilitators and thus help teams to develop new ideas and new ways of working. As Senge et al (1994) indicate ".every organization is a product of how its members think and interact" (p48). Therefore, key words within an organization should be participation, partnership and empowerment of staff.

The whole issue of stress in qualified staff and its effect upon the satisfaction of student nurses in the clinical learning environment appears to be centred around the issue of leadership style employed in the clinical area. The importance of this finding in relation to the training needs of student nurses, together with reflections on the study, and recommendations for change in practice, are considered in the final chapter.
Chapter 8

Final discussion, Reflections, Conclusion and Recommendations

Discussion
The implications of this study need to be seen in the context of the changes which have taken place in the health service and nurse education during the period of the investigation. The study was started some seven years ago in order to examine the reasons why student nurses gained much satisfaction in some clinical learning areas, but not in others. Findings from my earlier study (Burrows 1989), together with personal observations and feedback from students at that time, suggested no specific reason why this occurred. However, informal conversations with qualified staff suggested that the underlying cause could be due to the stress in trained staff. The initial aim of the study, which was to explore the relationship between student satisfaction and staff stress, was therefore founded on an idea gained directly from those in the clinical learning environment.

At the beginning of the study a deductive approach was planned in order to test this relationship but, due to problems at that time in identifying appropriate measuring tools, the study commenced with an inductive approach to develop methods of measurement. These newly designed tools were then used in a survey to test the hypothesis that there would be a relationship between staff stress and student satisfaction with the clinical learning environment. The stressor scale for qualified staff and the clinical learning environment satisfaction scale for students produced distinctive and easily identifiable
factors, but the emotional response measure, which was designed to provide a link between the two aforementioned scales, did not prove to be a satisfactory measurement tool. The hypothesis that there would be a relationship between staff stress and student satisfaction was not upheld. As intuitive knowledge suggested there was a relationship between these variables I decided that the issue required further investigation. Rather than test the satisfaction scale and the stress scale across a wider population and compare the results with validated measures, I decided to explore the issue using an inductive qualitative approach. The whole study was therefore not only based on an idea provided by qualified nursing staff but so too has it involved both qualified staff and students in all phases. The high response rate in all stages has been attributed to this fact.

Whether, on reflection, the phases of the study were in the best sequential order is open to debate. In retrospect, more information, particularly in respect of the effect of leadership style, may have been identified sooner if the initial phase had been based on a grounded theory approach. This could then have been used to develop the questionnaire to survey a wider sample group. Selection of clinical areas to study could have been based on verbal feedback from students in order to compare good with poor learning areas. However, these observations are made with the benefit of hindsight. In fact, because the study initially commenced with a fairly clear hypothesis, the natural sequence at that time appeared to be the use of a deductive approach. As has already been indicated, the final structure of the study evolved as a natural outcome of the problem-solving process and the need to adapt to the circumstances encountered. It is considered that the
order in which the phases were carried out provided a progressive accumulation of data using methodological triangulation.

The original hypothesis, that stress in trained staff was associated with lack of satisfaction on the part of students was not upheld during the quantitative phase of the study. There were a number of possible reasons for this, including the possibility that the hypothesis was incorrect, or that the measurement tools were not sufficiently sensitive to pick this up. Findings from phase 3 would appear to support an alternative explanation based upon the theory of stress outlined in Chapter 2. In phase two, it was identified that clinical areas which had previously attracted positive student comments scored high on both organisation and atmosphere aspects of the student satisfaction scale, whilst areas which had attracted negative comments were those which scored lowest on the atmosphere scale. The detailed comparison of high and low scoring areas in phase 3 suggested that the combination of lack of personal control over aspects of the work, together with lack of availability of perceived support and social integration within the clinical environment, has the potential to increase stress among trained staff and reduce satisfaction among students.

However, it would appear that the trained staff adapt to their lack of control by the use of task-oriented work patterns as a coping strategy. The highly structured method of problem solving, implicit within this pattern of care, appears to reduce the sense of stress and anxiety among trained staff, but so too does it reduce their sense of achievement and job satisfaction. In the short term this may be regarded as an adaptive coping
strategy, because it reduces some of the tensions associated with high work pressure, but in the longer term, the reduced job satisfaction leads to increased sickness and absence and eventually increases staff turnover.

In contrast students working within clinical areas which had adopted an individualised pattern of patient care tended to express higher satisfaction with both the organisation of and the atmosphere in the learning environment. However the two clinical areas, which were selected on the basis of high student satisfaction, for the in-depth study, actually showed substantial differences in perceived levels of stress among qualified staff. From a trained staff point of view the literature would suggest that an individualised pattern of patient care increases the emotional demand on staff and implies that stress levels would be higher. The findings from the clinical area which used a primary nursing care approach indicated that the low stress of qualified staff found in phase 2 could be accounted for by the high level of social support and social integration. This in turn led to a high level of staff commitment and job satisfaction, a consequent reduction in sickness / absenteeism and low staff turnover. It is suggested that is was the presence of social support and social integration, together with the fact that students were putting into practice the individualised approach to patient care which they had learned in the classroom, which accounted for their high level of satisfaction.

It is an important criticism of this study that the comparisons made in the final qualitative phase were between clinical ward areas on one hand and one departmental area on the other. However, it is of particular interest to note that previous studies (Brunt 1984a,b; Walsh 1988) have suggested that student
anxiety is usually highest in such departmental areas. Since the departmental area concerned could not be distinguished between those in other studies on the basis of the apparent demands of the workload, which were high, this actually lends support to the explanations given below which relate to the issue of leadership.

Phase three revealed that the unifying factor for these variations was to be found in the style of leadership adopted by the leader of the clinical area. The clinical area which was associated with high student satisfaction demonstrated a participative style of leadership which delegated responsibility, and facilitated the development of staff support systems. The clinical areas which were associated with low student satisfaction employed authoritarian styles of leadership which encouraged task-based approaches to patient care. Although this denied staff the responsibility for individualised patient care, it had the effect of reducing the need for staff support, given the high demands of the workload.

The theoretical prediction was introduced, that lack of support may be compensated for by maintaining a high level of control. In the case of the two clinical leaders who used authoritarian approaches, it was evident that lack of continuity of manager resulted in them receiving very little support despite a high level of expectation and demand. Therefore it could be argued that their continued use of a style of leadership based on a high level of control was a response to the situation in which they found themselves. Many of these issues must remain speculative since neither of these leaders were willing to be interviewed.
Reflections on the study design and tools

The study combined inductive and deductive methods to determine if there was a relationship between the stress in qualified staff and the satisfaction students had with the clinical learning environment. Whilst this combination of approaches has provided rich data about the situation in the clinical learning environment, it could be argued that it would have proved more advantageous in phases one and two to have used published measuring tools with a known reliability and validity, rather than designing new ones. However at the time this study was undertaken published stress measuring tools were, for the reasons discussed in chapter 3, not considered by myself to be appropriate to achieve the desired objectives.

Although the reliability and content validity of both the staff stressor scale and the clinical learning environment satisfaction scale were judged to be satisfactory during the design, development and piloting phase of the study construct validity of both these tools was not assessed until sufficient data was obtained from the survey in phase two. Construct validation was assessed using factor analysis, which groups together different measures of the underlying attributes and allows for exploration of the convergent and discriminant validity of the measures. Factor analysis identified four factors for qualified staff - interpersonal, emotional involvement, workload, and resources, and two factors for students - interpersonal and organizational. The factor structure of the newly designed instruments was verified when it was found that issues central to all these factors were found within the six categories identified during the final qualitative phase of the study. Thus the qualitative findings confirmed the predictive validity of these tools.
Whilst in retrospect The Ward Learning Rating Questionnaire (Fretwell 1985) may have provided sufficient data to indicate the importance of the leadership style within the clinical learning environment, it did not include all the facets which were included in the clinical learning environment satisfaction scale. This latter tool, based on content provided by students, not only provided sufficient data but has also, since then, proved to be a useful satisfaction measurement tool within other caring contexts. It has already been adapted and used in an evaluation study on a midwifery unit (Walker 1996), and a further study is in progress to compare the satisfaction of student nurses against those of patients. Another colleague is considering its use among senior medical students.

Whilst the content, construct and predictive validity of the clinical learning environment satisfaction scale and the staff stressor scale have been assessed, it is considered that further testing of these tools with different sample groups is desirable in order to provide additional supporting evidence.

The emotional response measure, the content of which was based on information provided by representatives from both groups of respondents, was intended to provide a link between the stress of qualified staff and the satisfaction of students. It is now apparent that it not only contains different dimensions of emotions but so too does it contain socially constructed emotions which are not appropriate for all respondents in the intended sample groups. As it does not fulfil the objectives for which it was designed its use in future studies is not recommended.
To what extent the subtleties in the relationship between stress in qualified staff and satisfaction of students could have been identified by ‘pairing’ students with their mentors is open to speculation. Whilst this would have been the preferred approach the fact that students are normally allocated to a team of mentors and associate mentors would not have made this a viable proposition. The complexities of the interrelationships between stress and satisfaction were mainly identified by the final qualitative phase of the study. The latter, which provided the richest data about the actual situations encountered in the clinical learning environments, not only highlighted the main finding of this study which is the importance of the style of leadership in the clinical learning environment, but so too did it give credence to the predictive validity of the staff stressor and clinical learning environment satisfaction scales used in the survey.

Despite the reservations in respect of the tools actually used I consider that the design of the study, as executed, has not detracted from the overall findings. The use of the three phases has provided a triangulation approach whereby findings from each phase have reflected and confirmed those from other phases.

**Reflections on the changing context of the study**

Over the period of this study there have been a number of changes, both locally and nationally, which have affected the organisation of health care and thus by implication the individuals working within the institution. The implementation of recommendations of the Griffiths Report (1983) and Working for Patients (1989) have, during the time the study was carried
out, resulted in the introduction of a number of local fund-holding general practitioners, and trust status for the local hospital. The newly formed trust hospital initiated a number of cost-cutting strategies, which led not only to an increase in patient throughput, but also a rationalisation of the staff. The area leader was assigned twenty-four hour responsibility for a specified area of clinical practice. On top of the need to fulfill a clinical leadership role, quality control, cost containment and employment of staff were included within the remit of this individual.

At the time these changes were being introduced, so too were the recommendations from the Patient's Charter (1991) and a Vision for the Future (Department of Health 1993). Both of these reports had major implications for the organisation of nursing care. Not only did each patient expect to be allocated to a named nurse, but they were also led to expect individualised care. Some senior nursing staff (ie nurse managers) were quite keen to introduce a pattern of care which combined these two aspects, but in many areas the new approach was viewed very sceptically by the nursing staff. They felt threatened by an approach which they did not fully understand, and considered it cast doubts on their ability to function as a professional nurse. A number of staff preferred to use the 'tried and tested' methods with which they were familiar. This resulted in a situation where the desired approach of the nurse managers and the clinical staff were combined and team nursing was used. However feedback from students suggested that in reality it was task-based work albeit within a team of nurses. The team leader acted as named nurse for all patients cared for by the team of nurses.
When the study was started the approximate date for re-location of the hospital was known, but the changes indicated above (trust status, change in leadership role, individualised care, and the named nurse approach) were not. They were introduced quickly and with very little consultation with the front-line staff. Whilst the speed and challenges of these changes increased the anxiety for nursing staff, so too did the introduction of Project 2,000, a new scheme of nurse training. Student nurses, who had previously been included in the clinical nursing team numbers, were given supernumerary status for most of their training. Care assistants were employed to replace them, but many of these individuals had limited nursing skills. Qualified nursing staff in clinical areas, which had previously been used as student training areas, had to cope with an increased workload created by the cost-cutting strategies, as well as that resulting from the employment of novice carers.

The cessation of RGN training, together with the introduction of a diploma in higher education combined with RGN, and later commencement of the new Project 2,000 course, which combined a diploma in higher education with registered nurse training, created much anxiety for qualified staff. Apart from the fear that the new students would be extremely clever, much anxiety was generated from the fact that qualified staff perceived the new training would result in their becoming ‘second rate’ nurses. Most qualified nurses had experienced the fears and feelings which discontinuation of enrolled nurse training had caused within the profession. When that occurred enrolled nurses felt they were regarded as ‘lesser nursing individuals’ yet, now that a scheme was introduced where students would receive both a diploma in higher education and
registration as a nurse, many registered nurses felt in a similar position.

The actual school of nursing was, in 1992, relocated to a new site some thirty miles away. This tended to break the strong links which had been made between the clinical and tutorial staff. When the school of nursing was near the hospital tutorial staff not only met nursing staff in the clinical areas, but also shared meal and coffee breaks with them. Consequently good interpersonal relationships were developed between staff in the nursing school and those in the clinical areas. The change in academic environment broke the continuity of these relationships. Tutorial support for students and qualified staff was no longer so easy to achieve, which increased the anxiety of clinical staff even further. The distance between place of work and clinical link areas also made the situation more difficult for the researcher.

Variations on the changes which took place during the study continue to be implemented. In particular the concept of individualised care introduced by the Patient’s Charter (1991) and later endorsed by the Department of Health (1993), has been widened from its uni-professional, nursing only base, to one which includes health care workers from all disciplines. Whilst this patient-focused integrated care approach emphasises the need for strategy of care between patient and all professionals directly concerned with their well-being, so too does it require a blurring of the professional boundaries of these health care workers. This approach will require nurses to move from their present subordinate, subsidiary, semi-professional role to one where they will have equal standing with other health care professionals. If nurses are to execute
autonomy, authority and accountability within their specialist field, it will require the area leader to delegate them the responsibility to do so. This will, as identified, require the employment of a participative leadership style.

The changing focus of health care from one of illness to one of wellness has also been reflected in nurse education courses. All nursing courses not only highlight health promotion, holism and primary care, but they also emphasise the need for the nurse to act as an autonomous, accountable individual. Although students are still allocated to health care settings to consolidate their knowledge, develop practical skills, and internalise the values and norms associated with their chosen profession, many of these roles, which were previously within the remit of the area leader, have now been delegated to staff nurses. Apart from acting as mentor, facilitator and assessor for student nurses these individuals also act as role models for learners. If the latter are to be successfully socialised into the nursing profession it would appear prudent to ensure that staff nurses have both job satisfaction and job contentment. As identified both these can be derived from individualised patterns of client care as used by area leaders using participative styles of leadership.

It could be argued that the implementation of changes which took place during the period of the study increased the pressure for nursing staff. Hence the findings of the study could be considered a reflection of these numerous changes which occurred within the clinical learning areas, rather than a true picture of normality within these environments. However, as the collection of data took place over a relatively extended period of time (two and a half years), it is considered that any peaks in
the perceived stress of nursing staff in the clinical learning areas would not have lasted this length of time. The fact that findings from each phase of the study reflected and confirmed those made in other phases suggests that the underlying causes for stress/satisfaction were relatively consistent over a period of time. It is therefore argued that it is justifiable to make conclusions and recommendations based on the findings of this study, albeit it was carried out during a dynamic period of time for nursing staff in the clinical learning environments.

**Reflections on Personal Developments over the period of the study**

The period of the study was also a personal dynamic phase. Apart from the physical move to new premises, and the added travelling time this incurred, added responsibilities within work and for different teaching themes have added new dimensions to the job. In particular I have become more involved in teaching student nurses and qualified staff aspects relating to the nature of enquiry, both from quantitative and qualitative angles. Whilst these job enhancements provided a personal challenge within the job itself, it was difficult to 'switch off' from these after working hours and concentrate on the study. As the study progressed so too did the amount of accumulated information. This then required even greater mental agility to cope with a full time job and excess travelling, then spend time in the evenings and weekends writing up and discussing the findings. The actual design of the study and collection of data was easy compared to the writing up stage, as the latter has required long consolidated periods in order to immerse myself back into the findings. As indicated above this aspect proved to be the most difficult thing to achieve. Despite these personal
challenges, and the times when my mind felt torpid, most of the time spent on the study have been enjoyable and rewarding. The amount of personal learning which has taken place over the last seven years, and is continuing to take place, is incredible.

**Concluding Comments**

Despite the fact that this study has taken place during a period of extensive change within the health service, there is strong evidence to support the view that it is the style of leadership which is the key issue within the clinical learning environment. In particular the pattern of care chosen by the leader ultimately determines the quality of the learning environment for student nurses. Individualised client care approaches increase the satisfaction of students with the clinical learning environment, enhance the job satisfaction and job contentment of qualified staff and, according to the literature, result in a high standard of patient care. Present findings therefore support the notion included in *A Vision for the Future* (Department of Health 1993) and endorsed by Redfern (1995) that individualised patient care is a key facet for the future developments in nursing. Although Redfern (1995) suggested that individualised care was not synonymous with a particular system of ward organisation, present findings appear to indicate that this approach to care is best achieved where there is a participative style of leadership.

Participative leaders encourage named qualified staff to accept the responsibility and accountability for caring for named patients. This approach not only encourages staff to use their professional knowledge and skills to the full, but it also helps them develop the tacit understanding which is commensurate
with a professional practitioner. The autonomy implicit within this approach allows individual staff to control their workload and thus reduce the physical exhaustion associated with heavy work commitments. The combination of individualised client care, and the autonomy enhances the job satisfaction of staff, and thus limits the staff turnover and sickness/absentee rates. The need to employ bank/agency staff is reduced, which is not only cost-effective but so too does it allow the maturity of the nursing team to develop. This leads to the development of good interpersonal relationships within the working team and thus supportive strategies to evolve. These provide the students and qualified staff with a safe environment in which to extend their knowledge and skills.

Authoritarian leaders maintain control by the use of task-based approaches to patient care, and do not delegate responsibility to the staff. Due to the task-based and often ritualistic nature of work implicit within this pattern of care the actual workload is usually far greater than that required. There is an increase in nursing staff sickness/absentee rates, and ultimately a high staff turnover rate. Bank/agency staff need to be employed to ensure adequate staffing is available for patient care, but this means that relationships and interpersonal trust between individuals in the nursing team do not develop, consequently a high control pattern of care continues to be used. The lack of continuity and individualisation of client care does not lend itself to the high quality of patient care. Task-based approaches to client care would therefore appear to be costly to the trust hospital for several reasons. Firstly they perpetuate a pattern of care which published literature suggests is not commensurate with high quality patient care. Secondly they require increased monetary expenditure to employ bank/agency nurses during
periods of sickness/absenteeism/turnover of the staff. Thirdly nurses working in task-based areas do not use their knowledge and skills to the full, hence the trust hospital is paying for a service which it does not fully receive. Fourthly student nurses do not find task-based areas satisfactory learning areas, and it was clearly indicated that most would not want to work in such environments once qualified.

Overall the lack of job satisfaction and job contentment found in task-based areas increases the frustration of qualified staff and leads to despondency and low morale. The atmosphere created by such individuals is not conducive as a learning environment, neither are qualified staff of this disposition fit to act as good role models for the students.

It is therefore concluded that, similar to the findings made by Pembrey (1980), it is the style of leadership employed within the clinical learning area which is critical in determining many of the aspects which affect student nurses, patients and qualified nursing staff. In particular it determines the pattern of patient care adopted for use. Individualised client care results in a high quality of patient care, a good learning environment for student nurses, and qualified staff gain much job satisfaction and job contentment. It is therefore apparent that both clinical managers and educational tutorial staff have an invested interest in the implementation and maintenance of participative leadership in the clinical area and the use of an individualised patient care pattern.

**Practicalities of implementing change**

From an educationalist point of view if a clinical area fails to provide students with a satisfactory learning area the
immediate course of action is to re-allocate students to more suitable learning environments. Whilst this initial response may, in the short term, appear to be the most appropriate course of action, in the long run this approach may result in serious consequences for the future of the training school, and ultimately affect the care of patients. There are, within any health care setting, a limited number of clinical areas which can be used for student allocations. Whilst the loss of any of these clinical areas places a greater responsibility for student placement on those which remain, the latter can only cope with a predetermined number of students. Over the last two years the dramatic expansion of day surgery for patients has led to a situation where acute care surgical allocations for students are at a premium. If any of these areas are ‘lost’ as student clinical allocations, students may have to fulfill their surgical allocation in alternative hospitals - most of which are at least thirty miles away. Worse still the education of students within the hospital may be stopped if the English National Board deem the available total clinical experience too limited. It is therefore paramount that all possible clinical areas, particularly surgical ones, are of the standard required for student nurse allocation.

Apart from the above consequences it is also important for the future of patient care that all clinical areas should be considered as learning areas for student nurses. Unless students are exposed to particular clinical experiences during their course, they are inclined not to want to work in those specialities once qualified. Personal experience has also shown that qualified staff, on the whole, enjoy teaching and working with students. However, many of these registered nurses have also indicated that they would not want to work in clinical environments which were not student nurse training
areas. If specific clinical areas become devoid of students, difficulties may, in the future, be experienced in the employment of registered nurses for that environment. It is therefore in the interests of educationalists and service staff that the clinical environments achieves a high quality of patient care.

Whilst it may be in the interests of student nurses and the school of nursing that individualised patient care is practised, the direct relationship between the use of this approach and a high quality of patient care has been reported in a number of published studies (Reed 1988; Duxbury 1994). This, together with the need to achieve the standards laid down in the Patient's Charter, has provided service personnel with the incentive to change. The power to adopt new clinical practices is not within the remit of the tutorial staff, but lies directly with the area leader and the unit manager. However the shared interest which both educationalists and service staff have in the adoption of a participative leadership style, and its resultant use of individualised patient care, provides the tutorial staff with room for negotiation in this sensitive situation.

Whilst tutorial staff, with their defined clinical links, are well placed to monitor the experience of the students, if interpersonal relationship with nursing staff in these areas were strengthen it would enable tutors to contribute towards and encourage the development of quality standards of patient care. As student satisfaction and high quality patient care originate from very similar sources, monitoring of student satisfaction, using the clinical learning environment satisfaction scale developed during this study, may provide an indication of the standard of patient care which is being achieved. This
valuable information can be shared between tutorial staff and service, and ultimately used to improve the patient care, student satisfaction with the clinical environment, and qualified staff job satisfaction.

**Recommendations**

Based on the findings of this study and the practicalities mentioned above the following recommendations are made:-

- There are good reasons to suggest that participative styles of leadership, where staff are delegated responsibility, authority and accountability, should be adopted for use in all clinical areas.

- Area leaders should not be expected to undertake changes in their leadership style without further training and the full support of their unit manager. Research into the needs of the area leader and how they are to fulfill their new role is urgently required.

- Individualistic and holistic patterns of care should be used in all patient care areas. In clinical areas where such care patterns are not used support from managers and educationalists should be given to enable staff in these environments to develop an individualised and holistic approach to patient care.

- It is strongly recommended that students should not be allocated to areas where it is known that task-based patient care is carried out.
• Monitoring of student satisfaction with the clinical learning environment should be undertaken immediately after the student has completed each clinical allocation. Feedback from this should be given to nurse manager, area leader and nursing staff associated with the clinical area. Whilst the clinical learning satisfaction scale developed during this study has been assessed and found satisfactory for its reliability and validity, it is recommended that further testing of this tool should be undertaken before it is accepted for general use.

• Monitoring of qualified nursing staff stress should also be undertaken regularly. Although the staff stressor scale developed during the present study has been assessed for its reliability and validity it is also recommended that further testing of this tool should be undertaken before acceptance for general use. Due to the dynamic nature of nursing review of the stressors which comprise this tool should also be undertaken periodically to ascertain their relevance.

• The development of supportive strategies among staff should be encouraged. There are good reasons to recommend the incorporation of formal and informal meetings into the daily work pattern. Clinical supervision needs to be fully implemented into the clinical area.

• Each clinical area should have its own bank of nursing staff who can be employed when required. This would not only provide the opportunity for consolidation of the nursing team to be achieved, but continuity of patient care is enhanced by this approach.
• On-going education of qualified staff, whether through the use of academic courses or in-house methods should be accepted as the norm. Nursing staff of all grades should be taught and encouraged to reflect ‘in’ and ‘on’ their practice. It is only by carrying out this activity will the intuitive knowledge of the nurse will be developed. The whole emphasis within the clinical setting should be its development as a learning area for all.

• Stronger links between the tutorial staff and clinical nursing colleagues in specified areas need to be developed. Academic leaders need to acknowledge the importance of the clinical environment for student learning, and thus grant tutorial staff the time and opportunity to develop strong interpersonal and trusting relationships with clinical staff. Unless this is carried out tutorial staff will not be given the opportunity to help nursing staff improve the clinical experience for students.
References

Adair J. (1990) Great Leaders
Talbot Adair Press. Brookwood.

Nursing Research 31(1) 48 - 53


Audit Commission (1991) The Virtue of Patients
H.M.S.O. London


Journal of Nursing Administration Sept. p 13-18
Beck A.T.  
Mendelson M.  
Mock J.  
(1961)  
Inventory for measuring depression  
*Archives of General Psychiatry* 4; 561-571

Benner P.  
(1984)  
*From Novice to Expert: excellence and power in clinical nursing practice*  
Addison-Wesley. Menlo Park. California

Berry L.M.  
Houston J.P.  
(1993)  
*Psychology at Work*  
Brown and Benchmark U.S.A.

Billings A.G.  
Moos R.H.  
(1981)  
The role of coping responses and social resources in attenuating the stress of life events.  
*Journal of Behavioural Medicine* 4, 139-157

Birch J.  
(1979)  
The anxious learner  
*Nursing Mirror* 8, 17-22

Blegen M.A.  
Mueller C.W.  
(1987)  
Nurses’ job satisfaction: a longitudinal analysis  
*Research in Nursing and Health* 10 (4). p 227-237

Blegen M.A.  
(1993)  
Nurses’ job satisfaction: a meta-analysis of related variables  
*Nursing Research* 42(1) Jan-Feb p 36-41.
*Journal of Advanced Nursing* 18, p 767-775

*Journal of Advanced Nursing* 21, p 314-324

*Nursing Times* 80(7), p 28-32.

*Nursing Times* 80(8), p 37-38

*Nursing Standard* Vol 9 (21)  
p 22-23

*Senior Nurse* Vol 13 No 3  
May/June, p 28-29.

Bucknall T. Thomas S. (1996) Critical care nurse satisfaction with levels of involvement in clinical decisions
Journal of Advanced Nursing 23, p 571-577

Burrows E.A. (1989) Clinical Learning Audit - the need to develop a tool
King Alfred's College. Winchester
Unpublished B.Ed Dissertation

Nursing Management 20(8), p 45-48

Campbell C. (1985) Disturbing findings
Nursing Mirror 160, No 26, p 16-19

Journal of Advanced Nursing 20, p 1125-1131

Cavanagh S.J. Bailey J. (1992) Job satisfaction of nursing staff working in hospitals
Journal of Advanced Nursing 17, p 704-711

Critical Care Quarterly 9(3). p 84-92
<table>
<thead>
<tr>
<th>Author(s)</th>
<th>Year</th>
<th>Title</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cohen S.</td>
<td>1984</td>
<td>Interpersonal relationships as buffers of the impact of psychological stress on health.</td>
<td>IN A. Baum, J. E. Singer, and S. E. Taylor (Eds) <em>Handbook of</em></td>
</tr>
<tr>
<td>McKay G.</td>
<td></td>
<td><em>psychology and health.</em> Vol 4, p 253-267. Lawrence Erlbaum, Hillsdale, NJ.</td>
<td></td>
</tr>
<tr>
<td>Constable J.</td>
<td>1986</td>
<td>The effect of social support and the work environment upon burnout among nurses</td>
<td><em>Journal of Human Stress.</em></td>
</tr>
<tr>
<td>Russell D.</td>
<td></td>
<td><em>Spring.</em> p 20-26</td>
<td></td>
</tr>
<tr>
<td>Dean C.</td>
<td>1989</td>
<td>Do psychological factors predict patient survival in breast cancer</td>
<td><em>Journal of Psychosomatic Research</em></td>
</tr>
<tr>
<td>Surtees P.G.</td>
<td></td>
<td><em>33.</em> p 561-9</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dewe P.J.</td>
<td>1987</td>
<td>Identifying the causes of nurses stress: a survey of New Zealand nurses</td>
<td><em>Work and Stress</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td><em>1(1).</em> p 15-24</td>
<td></td>
</tr>
</tbody>
</table>
Dick M.J. (1992) Burnout in doctorally prepared nurse faculty 
*Journal of Nursing Education* 31(8). p 341-6 Oct

King's Fund Publishing Office. London.

*Journal of Advanced Nursing* 12, p 3-12

Duxbury J. (1994) An investigation into primary nursing its effect upon the nursing attitudes about, and administration of, prn night sedation. 
*Journal of Advanced Nursing* (19), p 923-931

*Nursing Research* 33, p 97-101

*Journal of Nursing Administration* 22(2). p17-22
English National Board for Nursing, Midwifery and Health Visiting. London

Eraut M. (1994) Developing Professional Knowledge and Competence
The Falmer Press. London.

Fiedler F. (1981) Leadership Effectiveness
American Behavioural Scientist Vol 24, No 5. May/June p 619-632

Firth M.
McIntee J.
McKeown P.
Britton P. (1986) Interpersonal support among nurses at work
Journal of Advanced Nursing 11, p 273-282

Firth H.
Britton P (1989) 'Burnout', absence and turnover amongst British nursing staff
Journal of Occupational Psychology. 62, p 55-59

Flagler S
Loper-Powers S.
Spitzer A (1988) Clinical teaching is more than evaluation alone
Journal of Nursing Education. Vol 27. No8, p 342-348

Fong C.M. (1990) Role overload, social support and burnout among nursing educators
Journal of Nursing Education 29. p 102-108
Fox J.  (1991)  Mentorship and the charge nurse  
_Nursing Standard_
5 (23) p 34-36

Foxall M.J. Zimmerman L. 
Standley R. 
Bene B.  
(1990)  A comparison of frequency and 
sources of nursing job stress 
perceived by intensive care, 
hospice and medical-surgical 
nurses.  
_Journal of Advanced Nursing_
15, p 577-584

Fretwell J.F.  
(1980)  An inquiry into the ward learning 
environment  
_Nursing Times Occasional Paper_
Vol 76. No 16 p 69-75

Fretwell J.F.  
(1982)  _Ward Teaching and Learning_
Royal College of Nurses. London

Fretwell J.F.  
(1985)  _Freedom to Change_
Royal College of Nurses. London

Gilloran A.  
McKinley A.  
McGlew T.  
McKee K.  
Robertson A.  
(1994)  Staff nurses' work satisfaction in 
psychogeriatric wards  
_Journal of Advanced Nursing_
20, p 997-1003

Giovanetti P.  
(1980)  A comparison of team and primary 
nursing care systems  
_Nursing Dimensions_
7(4) p 96-100

Glaser B.  
(1978)  _Theoretical Sensitivity_
Sociology Press Mill Valley, CA.
<table>
<thead>
<tr>
<th>Author(s)</th>
<th>Year</th>
<th>Title</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strauss A.L.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Gray-Toft P.</td>
<td>1981</td>
<td>Stress among hospital nursing staff: its causes and effects</td>
<td><em>Social Science and Medicine</em> 15A, p 639-647</td>
</tr>
<tr>
<td>Anderson J.G.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lincoln Y.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oldham G.R.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hackman J.R.</td>
<td>1989</td>
<td>Development of the job diagnostic survey</td>
<td><em>Journal of Applied Psychology</em> 60, p 159-170</td>
</tr>
<tr>
<td>Author(s)</td>
<td>Year</td>
<td>Title</td>
<td></td>
</tr>
<tr>
<td>---------------------------------</td>
<td>------</td>
<td>----------------------------------------------------------------------</td>
<td></td>
</tr>
<tr>
<td>Handy C.</td>
<td>1985</td>
<td><em>Understanding Organizations</em></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Penguin Books Ltd.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Hammondsworth</td>
<td></td>
</tr>
<tr>
<td>Hart G. Rotem A.</td>
<td>1995</td>
<td>The clinical learning environment: nurses' perceptions of professional development in clinical settings</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td><em>Nurse Education Today</em></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15, p 3-10</td>
<td></td>
</tr>
<tr>
<td>Haynes C.</td>
<td>1996</td>
<td><em>Management Development Initiative</em></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Institute of Work Psychology</td>
<td></td>
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<td></td>
<td></td>
<td>University of Sheffield.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Unpublished</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Personal Communication</td>
<td></td>
</tr>
<tr>
<td>Haynes C. Jackson P.</td>
<td>1995</td>
<td>Management styles, social support, and mental health in the NHS</td>
<td></td>
</tr>
<tr>
<td>Hersey P Blanchard K.H.</td>
<td>1982</td>
<td><em>Management of Organizational Behavior: Utilizing human resources</em></td>
<td></td>
</tr>
<tr>
<td>Hinshaw A.S. Smeltzer C.H.</td>
<td>1987</td>
<td>Innovative retention strategies for nursing staff</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td><em>Journal of Nursing Administration</em></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>17(6), p 8-17</td>
<td></td>
</tr>
</tbody>
</table>
Hipwell A.E. (1989) Sources of stress and dissatisfaction among nurses in four hospital environments
British Journal of Medical Psychology 62, p71-79

Hisashige A.
Koda S.
Kurumatani N.
Nakagiri S. (1989) Occupational influences on burnout phenomenon among hospital nurses
Sangyo Ika Daigaku Zasshi Vol 20. Part 11, p 454-466

Hemisphere Publishing Corporation. London

University of California Press. Berkley.

Holroyd D.
Crow S. (1993) ENB Guidelines for Educational Audit Quality Education for Quality Care
English National Board. London.

Homans G.C. (1951) The Human Group

Addison-Wesley, Reading Massachusetts


Kiely J. (1986) The dynamics of job satisfaction
- A longitudinal study
*Personnel Review*
15, 4, p 7-13.

*Journal of Nursing Education*
April Vol 29, No 4, p 183-187

Koch T. (1994) Establishing rigour in qualitative research: the decision trail
*Journal of Advanced Nursing*
19. p 976-986

Knowles M. (1990) *The Adult Learner: a neglected species*

Mosby. St Louis.

Krippendorff K. (1980) *Content analysis: An introduction to its methodology*
Sage, Beverly Hills CA.

Kuremyr D. Kihlgren M. Norberg A. Astrom S. Karlsson I. (1994) Emotional experiences, empathy and burnout among staff caring for demented patients at a collective living unit and a nursing home
*Journal of Advanced Nursing*
19, p 670-679
<table>
<thead>
<tr>
<th>Author(s)</th>
<th>Year</th>
<th>Title/Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lazarus R.L.</td>
<td>(1966)</td>
<td><em>Psychological stress and the coping process</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>McGraw-Hill. New York</td>
</tr>
<tr>
<td>Lazarus R.S.</td>
<td>(1981)</td>
<td>Little hassles can be hazardous to your health</td>
</tr>
<tr>
<td></td>
<td></td>
<td><em>Psychology Today</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>July p 58-62</td>
</tr>
<tr>
<td>Lazarus R.S.</td>
<td>(1984)</td>
<td><em>Stress, appraisal and coping</em></td>
</tr>
<tr>
<td>Folkman S.</td>
<td></td>
<td>Springer Publishing Company. New York</td>
</tr>
<tr>
<td>Lees S.</td>
<td>(1990)</td>
<td>The design of a stress management programme</td>
</tr>
<tr>
<td>Ellis N.</td>
<td></td>
<td><em>Journal of Advanced Nursing</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15, p 946-961</td>
</tr>
<tr>
<td></td>
<td></td>
<td><em>Journal of Health and Social Behavior</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>30, p 261-268</td>
</tr>
<tr>
<td>Leach J.</td>
<td></td>
<td><em>International Journal of Nursing Studies</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>19 (3) p 125-137</td>
</tr>
<tr>
<td>Lewis J.B.</td>
<td>(1991)</td>
<td>The importance of collaboration with Staff Nurses in the socialization of nursing students.</td>
</tr>
<tr>
<td>Deans S.L.</td>
<td></td>
<td><em>Nursing Connections.</em></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Vol 4 No 2. Summer.</td>
</tr>
</tbody>
</table>


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<tr>
<th>Author(s)</th>
<th>Year</th>
<th>Title</th>
<th>Publisher/Publication Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>McWilliam C Burdock J. Wamsley J.</td>
<td>1993</td>
<td>The challenging experience of palliative care support-team nursing</td>
<td>Oncology Nursing Forum Vol 20, No 5 p 779-785</td>
</tr>
</tbody>
</table>


Muldary T.W. (1983) *Burnout and health professionals: manifestations and management*
Appleton-Century-Croft. Norwalk Connecticut

*Journal of Nursing Administration* July-August 13 (7-8), p 20-26

Cassell Educational Ltd. London.

*Journal of Advanced Nursing* 6, p311-318

*Nurse Education Today* 6, 16-22


Pagana K.D. (1988) Stresses and threats reported by baccalaureate students in relation to the initial clinical experience *Journal of Nursing Education* 27(9) p 418-424


244
Pines A. (1981) *Burnout: from tedium to personal growth*  
Aronson E.
Kafry D.

Hungler B.P.  

Sharp G.R.  
*Journal of Advanced Nursing* 13, p 726-732

Mueller C.W.  
Iowa State University Press. Ames.

Ramsden P. (1980) Educating the quality of learning  
IN D. Billing (Ed) *Indicators of Performance*. Society for Research in Higher education

Reed S.E. (1988) A comparison of nurse-related behaviour, philosophy of care and job satisfaction in team and primary nursing  
*Journal of Advanced Nursing* 13, p 383-395

245
Redfern S.J. (1995) *The Meaning and Practice of Individualised Patient Care in Nursing - research highlights and implications for action*
Nursing Research Unit, King's College. London


*IMAGE: Journal of Nursing Scholarship Vol 19, No 2 Summer.*

Roberts L. (1980) Primary Nursing
*The Canadian Nurse* 76(11) p20-23

Blackwell Science. Oxford

Rodgers S. Bond P. (1996) Research Based Practice and Perceptions of the Ward and Hospital Environment
presented at the Annual Nursing Research Conference Royal College of Nursing.
<table>
<thead>
<tr>
<th>Author(s)</th>
<th>Year</th>
<th>Title</th>
<th>Journal/Book</th>
</tr>
</thead>
<tbody>
<tr>
<td>Peterson R.A.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hayes J.R.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mirowsky J.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sandelowski M.</td>
<td>1986</td>
<td>The problems of rigor in qualitative research</td>
<td><em>Advances in Nursing Science</em> 8 (3) 27-37</td>
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*The Journal of Nursing Leadership and Management.* April, p 45-46.

Wyvern Business Training. England

Smith L. (1992) Ethical issues in nursing  
*Journal of Advanced Nursing* 17, p98-103

Smith P. (1988) The emotional labour of Nursing  
*Nursing Times* Nov 2.  
Vol 84, no 44, p 50-51

Spencer L. (1994) How do nurses deal with their own grief when a patient dies on an intensive care unit, and what help can be given to enable them to overcome their grief effectively  
*Journal of Advanced Nursing* 19, p 1141-1150

Spielberger C.D.  
Gorsuch R.L.  
Lushene R.  
Vagg P.R.  


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Staff shortages
Fluctuations in Workload
Too little time to do what is expected
Carrying out tasks outside your level of competence
Poor quality of support staff
Coping with new situations
Too much work
Lack of positive feedback about your work
Shortage of essential resources
Deciding priorities
Deadlines and time pressures
Frustration with conflicting procedures
Poor physical working conditions
Lack of job satisfaction
Lack of participation in planning/decision making
Coping with new technology
Lack of support from senior staff
Uncertain about your responsibilities
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Thank you for completing the above questionnaire.
Please be assured that all information given will remain confidential to the researcher.
Please return this form in the enclosed addressed envelope.
In respect of the following clinical situations please rate how they affect you. Tick in the column closest to the way you feel.

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Thank you for completing this form. Please be assured that all answers will remain confidential to the researcher. Please complete the questionnaire on the reverse of this page, then return to E.A. Burrows in the envelope provided.
Appendix 3

Code Number ..........

In this section there are a series of statements which can be used to describe the learning climate. They are grouped in pairs which refer to more or less opposite characteristics.

Please enter an X in the space on the scale which you feel comes closest to describing the learning climate of the ward to which you are allocated. There are no right or wrong answers. All replies will remain confidential to the researcher.

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<td>Discouraging</td>
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Thank you for completing this form. Please complete the reverse of this page then return to E.A. Burrows in the envelope provided.
Appendix 4

Code Number................

In respect of your present Work Environment please circle those words below which indicate the emotions you have felt to be fairly consistent during this past week whilst in your work environment.

There are no right or wrong answers, and you may circle as many words as you feel to be appropriate.
Please be assured that total confidentiality will be respected

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Thank you for completing this questionnaire. Please complete the questionnaire on the reverse of this form, then return to E.A. Burrows in the envelope provided.
Appendix 5

QUALIFIED STAFF

FACTOR ANALYSIS

SCREE PLOT

PC Extracted 5 factors
### SPSS/PC+

**FACTOR ANALYSIS**

**QUALIFIED STAFF**

Analysis Number 1  Listwise deletion of cases with missing values

Extraction 1  for Analysis 1,  Principal-Components Analysis (PC)

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Appendix 7

Qualified Staff Stressor Scale

The crucial word for each scale is:-

- Workload fluctuations: Fluctuations in workload
- Time: Amount of time to do what is expected of you
- Amount of work: Amount of work you have to do
- Lack of Feedback: Lack of feedback about your work
- Shortage of Resources: Shortage of essential resources
- Deadlines: Deadlines and Time pressures
- Conflicting practices: Conflicting procedures and practices
- Lack of participation: Lack of participation in planning/decision making
- Lack of support: Lack of support from senior staff
- Staff Shortages: Staff shortages
- Priority: Deciding priorities
- Support staff: Poor quality of support staff
- Physical environment: Poor physical working conditions
- Uncertain responsibility: Uncertainty about your responsibilities
- Emotional involvement: Emotional involvement in your work
- Lack of appreciation: Lack of appreciation by other staff
- Relationships: Relationships with nursing members of the caring team
- Working with Learners: Working with Learner nurses
FACTOR ANALYSIS

STUDENT NURSES

SCREE PLOT

PC Extracted 2 factors
### Appendix 9

**SPSS/PC+**

**FACTOR ANALYSIS**

**STUDENT NURSES**

Analysis Number 1  Listwise deletion of cases with missing values

Extraction 1 for Analysis 1,  Principal-Components Analysis (PC)

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<td>* 16</td>
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PC extracted 2 factors
Transcript of letter received from participant who reviewed the constructs and categories which resulted from data obtained during phase three of the study. Name and address of participant have been deleted from this transcript to preserve anonymity.

Dear Liz,

I have thoroughly enjoyed reading your work, and it's so typical of areas with which I am familiar.

I have read it twice to see if I could make some criticism but I can't. It's interesting, honest and fair, and applies to many, many hospital units.

I only hope that this will find its way to the appropriate bodies, so that we can improve nursing practices (more researched based), and achieve lower levels of stress among the staff at all grades.

Hope all is well. Many thanks.

See you soon.

Signed
### Identified Codes

<table>
<thead>
<tr>
<th>Lack of meetings</th>
<th>Development of Relationships</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant change of staff</td>
<td></td>
</tr>
<tr>
<td>Sister doesn't like you to stop and talk</td>
<td></td>
</tr>
<tr>
<td>Cannot get pally with students</td>
<td></td>
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<tr>
<td>Cannot get 'too close' to students</td>
<td></td>
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<tr>
<td>Informal chats at work not encouraged</td>
<td></td>
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<tr>
<td>Sickness led to employment of outsiders</td>
<td></td>
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<tr>
<td>Shortage of staff results in many agency/bank staff</td>
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<tr>
<td>Feel an outsider</td>
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<tr>
<td>Staff of all grades very supportive</td>
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<tr>
<td>Sister accepts that talking with each other is part of the job</td>
<td></td>
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<tr>
<td>Team work - not them and us</td>
<td></td>
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<tr>
<td>Get to know each other as people not just nurses</td>
<td></td>
</tr>
<tr>
<td>Feel accepted</td>
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<table>
<thead>
<tr>
<th>Lack of career pathway</th>
<th>Personal Development</th>
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<tbody>
<tr>
<td>No encouragement from ‘the top’</td>
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<tr>
<td>Managers rarely provide financial support</td>
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<tr>
<td>Lack of responsibility within the job</td>
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<tr>
<td>Work doesn't provide a challenge</td>
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<tr>
<td>Promotion is limited</td>
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<tr>
<td>Limited teaching for students</td>
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<tr>
<td>No trust given to staff from Sister</td>
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<tr>
<td>Personal value conflicts</td>
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<td>Lack of trust - so lack motivation</td>
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<tr>
<td>Feel bored</td>
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<tr>
<td>Feel frustrated</td>
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<tr>
<td>Encouraged in personal development</td>
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<tr>
<td>Able to reflect with others on work undertaken</td>
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<tr>
<td>'On the job' experience given</td>
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<tr>
<td>Financial and time assistance given to staff</td>
<td></td>
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<tr>
<td>Support from staff helps personal development</td>
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</table>
Identified Codes

Lack of support from Sister  
Lack of support from Manager  
Lack of sympathy from Sister when (individual) off sick  
Not trusted  
Managers not interested in clinical staff  
Lack of practical and emotional support  
Lack of team relationships - thus do not feel supported  
No backup  
Much criticism but little support  
Need for support after stressful incidents  
Feel supported  
Good mentor support  
Preceptor chosen carefully to suit individual requirements  
Supervised but not directed  
Positive praise  
Support helps in gaining confidence  
Support given freely from the top  
Staff meetings occur regularly - feel supported  
Informal meetings regarded as part of the job  

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<tr>
<th>Identified Codes</th>
<th>Level of Support</th>
<th>Category</th>
<th>Workload</th>
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<tbody>
<tr>
<td>Lack of support from Sister</td>
<td>Heavy</td>
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<tr>
<td>Lack of support from Manager</td>
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<tr>
<td>Lack of sympathy from Sister when (individual) off</td>
<td></td>
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<tr>
<td>sick</td>
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<tr>
<td>Not trusted</td>
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<tr>
<td>Managers not interested in clinical staff</td>
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<tr>
<td>Lack of practical and emotional support</td>
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<tr>
<td>Lack of team relationships - thus do not feel</td>
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<td>supported</td>
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<td>No backup</td>
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<td>Much criticism but little support</td>
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<td>Need for support after stressful incidents</td>
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<td>Feel supported</td>
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<td>Good mentor support</td>
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<td>Preceptor chosen carefully to suit individual</td>
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<td>requirements</td>
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<td>Supervised but not directed</td>
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<td>Positive praise</td>
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<tr>
<td>Support helps in gaining confidence</td>
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<tr>
<td>Support given freely from the top</td>
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<td>Staff meetings occur regularly - feel supported</td>
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<tr>
<td>Informal meetings regarded as part of the job</td>
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<tr>
<td>Heavy (Task based)</td>
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<tr>
<td>Task based</td>
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<tr>
<td>Ritualistic</td>
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<tr>
<td>Tradition - controlled by Sister</td>
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<td>Exhausted</td>
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<tr>
<td>Lack of staff increases workload</td>
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<tr>
<td>Lack of 'quality staff' increases workload</td>
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<tr>
<td>Cannot do the job the way I really want to do</td>
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<tr>
<td>Too much to do - not enough time to do it.</td>
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<tr>
<td>Feel rushed</td>
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<tr>
<td>Students increase the workload</td>
<td></td>
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<tr>
<td>Feel secure using traditional approach</td>
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<tr>
<td>Frustrated by time constraints</td>
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<td>Enjoy the autonomy</td>
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<td>Feel responsible for my work</td>
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<tr>
<td>Able to plan and execute own work</td>
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<tr>
<td>Can use research in work</td>
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<td>Increased accountability</td>
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<td>Students are an asset</td>
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<td>Identified Codes</td>
<td>Category</td>
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<td>-----------------------------------------------------</td>
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<tr>
<td>Ritualistic</td>
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<td>Sister in control</td>
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<tr>
<td>Overtime ++</td>
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<tr>
<td>‘do the obs’ i.e. task based</td>
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<tr>
<td>Too much unnecessary work</td>
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<tr>
<td>Jobs - not people care</td>
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<tr>
<td>Haphazard organisation</td>
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<tr>
<td>Traditional approach</td>
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<tr>
<td>Pressure of work encourages task approach</td>
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<tr>
<td>Tasks ensure all the work gets done.</td>
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<tr>
<td>Able to plan own workload</td>
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<tr>
<td>Enjoy the responsibility</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Feel I am working to my grade</td>
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</tbody>
</table>

Bank staff make up 50% of shift staff
Some bank more like ‘part timers’
Students lack motivation/interest
Cannot depend on bank staff and students
Feel depressed if bank staff on
More responsibility when working with bank staff
Increased complaints from patients
It's good to have students
Good teamwork
Transcript of interview with staff nurse on specialist unit
(Me = interviewer  R = staff nurse respondent)

Me As I explained in my letter I am trying to find out why students enjoy some wards and not others. Would you please tell me about this working environment

R Well .... most of the time I like the work. I love to be busy, but recently it has been really bad with the staffing - low staffing all the time, with about 50% bank staff all the time. It makes it very difficult, much harder work. I mean half the time you haven't anybody to rely on. It's not their fault that they do not know what they are doing. They do not know the area as they do not come here often. Some of them do as they are regular bank and they are like part of the team so that's fine. But if they do not know the ward its very difficult. It puts a lot back on us, and I think that has made the standards of care drop. There is a lack of quality staff. Just before Christmas we had a very bad time. I think it was when the last lot of students had finished here, and we had a lot of bank staff. We had about five complaints in that time. They were all things which related to not having enough staff. In some ways students - because they are here for a long period of time - are better than the banks staff.

Me Do students enjoy the work here?

R They told their tutor that they did not get much support from us. But I found that if there was a problem they did not come
and tell us. In my training I would have said something to somebody. The tutor felt we ought to befriend them. But that's OK, but you have to be professional - you cannot be pally with them - you are meant to be teaching them. And anyway they are only here for eight weeks, so you cannot get really friendly with them. Sometimes I think they are scared. ... Mind you so I would be with nobody really supervising them. There is only a maximum of six of us on in the morning. But if you are supervising them, and that means working with them, you cannot always do it. Well for example if there is me and my student and the rest are bank staff I have to be running the ward as well, and I cannot be working with my student all the time. And it's no good saying it doesn't happen because it does.

Me How do you feel about that?

R It makes me cross as you are supposed to be teaching them but we are not given the staff. You have to think for the bank staff and the students. It makes me very cross as you cannot give the patients the care they need, and you cannot be watching, you know supervising, everybody. Let me give you an example. The other day a patient came back from theatre and the Registrar mentioned she had a friction burn under her arm. Nobody had said anything. She'd been looked after by bank staff for a few days, but they hadn't said anything. The staff nurse in charge cannot be looking after students and checking on bank staff. So it was missed. That's the sort of thing which relatives write in about.
Me How do you cope?

R Sister supports us. I think she takes on more than she should when there are complaints. I know she is in charge but we are all responsible for our actions, and I do know she will go and see the manager about the complaints. But I think it should be the nurse who created the problem who should deal with the manager. She (Sister) does take a lot on, and she will also stay late. Mind you she does check on us. In the end you get in a bit of state, and I think why should I bother to do things if she is always going to check up in what I am doing. I think she will end up making herself ill. But she does support us. But we don't much support from the manager. In the past two years we have had so many managers! Mind you Sister doesn't get much support from the manager. For example the other day - I was off sick. A colleague was in charge and an agency nurse arrived. My colleague told her she would have to give her some responsibility, whereupon the agency nurse said no way and walked off the ward! The staff nurse took her complaint to the manager who wrote it all down. But we have hard no more since then. When I came back the following day I felt really guilty about being off sick. If you are feeling ill and you look at the off duty you feel you must come in or you will let the team down. Sister rarely has any sick time but when anybody else does she does rather complain about it. However I do think there is a lot of sickness on this ward which is not genuine - in fact I know there is among certain people. One person I can think of is not happy here and she wants to leave She'll go off sick at the slightest thing.
Me Nodding gently

R There are two people - one has just left - who have been off with depression. I sometimes get to the stage when I feel I cannot cope anymore. But I tend to go home and let it all out. But I don't know if that is a good thing or a bad thing. The other thing I do is to kick the filing cabinet - quite frequently.

Me Honestly? (laughing)

R Yes! Yes! (laughing)

Me What makes you feel like that?

R I don't mind being really busy if you have the staff on who you can depend on. If you have a good set of staff on, and you think its going to be a really awful shift or really really busy, you can always have a bit of a laugh about it. But when you find you have a load of bank on, and you find there is somebody there you don't know or who you really don't get on with, that's when I get really depressed.

Me How do you cope?

R If I have been on for a really long stretch, or its been really bad then I have a good cry and then I feel better. Its not often because usually I can have a good go at somebody, or go and kick the filing cabinet. Or go home and winge at somebody else..then I'm OK. I cannot see it changing or getting any better. If there was nobody around I don't know how I would deal with it
then. At home we have an agreement that I am only allowed a 5 minute winge and then that’s it. Sister worries me though. She has a stomach ulcer. Mind you she still keeps on smoking! But at least she has her holidays unlike the Sister on the other (specialist) ward, who I understand from my colleagues there, has not had a holiday for nearly three years. Mind you Sister here comes in on her days off. If we are short Siser will even do a split shift. I do think she stays too late. I mean sometimes on an early she is here until 8pm or 9pm

Me How do you feel when she stays late?

R It bugs me. But then I try and ignore her and not listen to her. If a patient is admitted she” say put them in that bed, so I immediately put them in another one! But yes it does bug me. Mind you when we are not busy I go early if possible. Sister doesn’t make you feel you have to stay, but if there are things which I have not done and I feel I should have, I do like to do them before I go. It is a job where you are never going to finish and you have to hand things on to the next person. But I don’t like it when I haven’t enough time to finish my work, or have enough time to go through things with the students - explain things to them. Mind you its quicker to do things yourself than explain everything to the students. I get really cross when I cannot give the patients the care they need as I haven’t the time.

Me Time?

R Well... we have dropped some of the rituals .. if we really
have taken on individualised care why do we have to wash everybody in the mornings? We give everybody a full wash every day - some of the elderly don't do it like that at home so why do we have to do it here. Why every day? Although we are supposed to be doing team nursing its still task based - you know do the obs etc.

Me Is there anything else you would like to say?

R Yes - I would like more responsibility - its the ‘top’ who won’t give it to us. She doesn’t allow us to change anything - I would need courage to try and change anything. Sometimes I wish I had that courage! What I actually do is to do things the way they should be done and I just keep quiet - we all do. I would like to go up the ladder and be more challenged by my work but I know that will not happen on this ward....But its really the lack of staff, lack of quality staff and lack of equipment - like lifting aids - which also annoy me.....And then there is also nobody to go and talk to. Let me give you an example. I was on a late shift with a newly qualified staff nurse who had come from another hospital, and an auxiliary. We had three people in the annex - one dies, one was dying and the other one crashed! It had been a really bad shift, so I phoned up site cover and asked if somebody could come down to the ward so that we could have a cup of tea and just talk over things as we were all upset. It doesn't matter how many times you see people die, it still upsets you. It would have been nice to have somebody to go and talk to.....(Pause) Mind you it would be nice to talk, just talk. We used to have ward meetings, but we don't now. We need one once a month when we could say what we want. We do talk to each other but we do not socialise with each other. Sister doesn't want ward
meetings. It would be so nice to have ward meetings and let people know how you feel, or just have somebody to talk to.

Me Well thank you for talking to me

R I've enjoyed it - its been nice to talk to somebody and have somebody listen to me
Appendix 13

Transcript of interview with student
(Me = interviewer, R = student respondent)

Me Tell me about the ward you have just finished.

R Well -for me its improved recently.

Me Why?

R There’s been a change in attitude towards me. Before I even got to the ward I made an off duty request. Well when I got there she (Sister) would never speak to me when I came on duty... but she never did with anybody. A couple of times she even shouted at me down the ward, which I found very hurtful.

Me Shout?

R Well ... on one occasion I was working on the right side of the ward, and there were three bank nurses on that side, plus one student who had gone off sick. I was on my own until the bank staff came on at 9.30 a.m. Well things like pressure area care you cannot do on your own. Well on this day she screeched at me because the PA care hadn't been done since just after 7 a.m. It was embarassing... But I must say as time went on during my ward stay her attitude towards me changed. She was actually pleasant to me. I wasn't singled out, but I was the only mature student on there at the time, and then of course I had asked for certain off duty before I had arrived.
Me Raised an eyebrow in a questioning look.

R Mind you there is a lot of back-biting among the other members of staff, but no one would actually come forward and complain about the running of the ward. I understand some of them wanted to leave and had even found other posts, but she wouldn't give them decent references. On other wards I have felt part of the team, and felt as though I was human, but on this ward it was students and them. Like coffee it was students at 10, and others at 10.30. On my last but one shift I was on a late with another student, and one of the staff nurses asked me where the 'other student' was - not by name. I did feel that after eight weeks she could have asked for her by name and not just as the other student. I always felt that students were not part of the team. I don't know if all the other students felt the same way but I did. You were certainly included when there was work to be done, you were allowed to do a lot of things. I cannot say we didn't get much experience - drugs, dressings etc. As far as work was concerned you were counted as senior. When there weren't auxiliaries on duty you were expected to do auxiliary work. (Forced giggle from student then a pause before she continued)

R I also felt there were a lot of rituals on that ward. Let me give you an example. After lunch all the patients go back to bed for a rest. During the day the bedclothes are folded back and then only pulled up at night time. Some patients prefer to get into bed properly rather than just have a sheet over them. But Sister won't allow them to do that. She likes the bed clothes left at the bottom of the bed and only used at night time! To me this was
unbelievable and is really a nursing ritual. TPRs are done sometime in the day usually anytime between 2 and 4.45 And of course it was nil by mouth from midnight. And of course there was betadine or hibitane in the bath water depending on which surgeon the patient was under....But I read that unless its of the right strength there is no point doing it, and in a bath it is too diluted, so its a ritual..... (student took a pause for thought)

On other wards which are just as busy its not so stressful. Nobody is there breathing down your neck all the time. Much of the work we do here is not necessary - like bed bathing every patient every day, and soaking their feet in water. Sometimes the patients don't want it, but they have to have it.

Me *Nodding head gently*

R If the ward had a more relaxed atmosphere I would have found it so much more enjoyable. It was so stressful in that atmosphere. And of course the report in the afternoon was often very late. We were nearly always off late - half an hour or more every day. On my last day there - the day before my exam - I asked to be off on time but my mentor did not get round to doing my profile until 3.10, and by the time it was fininished it was 4 p.m. Mind you the ward wasn't all bad - I enjoyed the patients. But I do wonder about the rationale behind the care we had to give. There seemed to be from the trained staff that you did not question anything, you just did it. I have never found this on other wards which I have been on. Sister here will never delegate and she stays on for hours after she should have gone home. And then she bought all her staff a Christmas present which made me feel awful.