HANNELE TURUNEN

Critical learning incidents and use as a learning method
A comparison of Finnish and British nurse student teachers

Doctoral dissertation

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ABSTRACT

The purpose of this study was to investigate Finnish and British nurse student teachers’ experiences of becoming a reflective nurse teacher during the process of teaching practicum by describing 1) nurse student teachers’ critical learning incidents; 2) the analyses of critical learning incidents as a teaching and learning method in reflection seminars and 3) the comparisons between similarities and differences in experiences of Finnish and British nurse student teachers.

Data were collected from Finnish (N=25) and British (N=17) nurse student teachers using the written descriptions of critical learning incidents (= 138 critical learning incidents: 70 positive and 68 negative). In addition, twelve Finnish and eight British student teachers were interviewed. The data were analysed using descriptive phenomenological method that resulted in different types of general structures describing student teachers’ experiences of becoming a reflective nurse teacher.

Results indicate that the significance of mentor was evident in both types of the Finnish and British nurse student teachers. One common type “mentor’s collegial attitude to organize learning opportunities strengthening student teacher’s teacher identity and motivation to self-development” emerged. The student teachers’ learning needs, goals, and opportunities to achieve the goals were analysed by the mentor along with the student teacher. A mentor’s collegial attitude increased the student teacher’s self-confidence as a prospective teacher and the feeling of being a member of a teaching team. However, a mentor’s uncollegiality and problems in the mentor – student teacher relationship caused uncertainty and decreased student teacher’s self-esteem.

Collaboration with peer students was a significant meaning that emerged in many Finnish nurse student teacher types. A type common to both Finnish and British nurse student teachers appeared and was labelled "team teaching with peers". Team teaching with peers fostered the student teacher’s self-confidence as a prospective teacher and taught collaborative skills such as listening to other students and arguing one’s own views. Peer support was significant in team teaching and in assessment as well as the feeling of responsibility of a joint teaching session. In addition, collaborative studies provided a positive opportunity to undertake conflict assessment that belongs essentially to collaborative work.

Both Finnish and British nurse student teachers experienced that the use of the critical learning incident analysis method fostered their growth as a nurse teacher. The significance of sharing experiences and the joint analysis of critical learning incidents with peers expanded one’s thoughts and deepened learning through becoming aware of similarities and differences belonging to the different peers’ experiences. The co-mentoring model between university and teaching practicum organizations should be systematically developed and continuous training for mentors should be guaranteed. Quality criteria for mentoring in teacher training should be developed and the quality of mentoring should be assessed in order to develop high quality nurse teacher education.

In the future it is important to clarify why some students experience collaborative studies negatively and what factors can be anticipated and processed explicitly during the tutoring process leading to student teachers’ commitment to collaborative studies. In addition it is important to investigate the significance as to the use of critical learning incidents in reflection seminars anonymously or not and the related advantages and disadvantages. Additional evidence is needed as to the use of critical learning incident analysis for conducting deepened learning as compared to other student-centred teaching and learning methods. This could be clarified by educational intervention with the systematic use of the critical learning incident analysis in student teachers’ studies in experiment comparison design.

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APPENDICES
1 INTRODUCTION

Experiential learning and teaching strategies have become popular in nursing education since they are assumed to foster the development of high quality professional knowledge, skills and attitudes that are based on practice through the use of reflection on action (Burnard 1992, 1995, Procter & Reed 1993, Parker et al 1995, Hallet 1997, Smith 1998). During the past two decades several educators have confirmed the importance of students’ experiences in the learning process (e.g. Kolb 1984, Knowles 1985, Mezirow 1990) and reflection is a central component in transforming experiences towards learning something new (e.g. Schön 1983, 1987, Boud et al 1985, Mezirow 1990). Currently, learning has been described as a constructivist process in which students actively construct knowledge based on their experiences (Cust 1995, Tossavainen 1999a, Turunen et al 1999, Tynjälä 1999).

Higher education has been criticised for not paying enough attention to learning and teaching processes (e.g. Tripp 1993, Tossavainen et al 1998, Jarvis 1999). Jarvis (1999) states that education should prepare students for intensive learning in order that knowledge will be understood and applied in professional work. However, universities teach information instead of knowledge. For this reason the concept of personal theory becomes significant. The dynamic nature of knowledge and its exponential growth signify that during education students have to achieve the skills of seeking, processing and applying information in order to learn the skill of critical reflection. Several studies show that students need the teachers’ support during different stages of the learning process since the achievement of these skills does not happen automatically and completely independently (e.g. Richardson & Maltby 1995, Suhonen & Tossavainen 1996, Wilcox 1996, Turunen et al 1997, Camiah 1998, Tynjälä 1999, see also Grow 1991).

The significance of nurse teacher education is central in renewing the educational practices of nursing education and in educating high quality health care professionals to the needs of society. The skills of collaboration, mutual respect, collegiality, critical thinking and problem solving, effective communication and team work are essential goals for all nurse teachers as well as nursing students (e.g. Leino-Kilpi 1990, Fagerberg 1998, Silen-Lipponen et al 1998, 2001, Tossavainen et al 1998). Recent studies indicate that learning these skills is not
by educators nor the learning environments where nursing students study (Hakkarainen & Janhonen 1997, Carniah 1998, Jaroma 2000).

Although critique towards teaching and learning methods in higher education has emerged much effort has been exerted in recent years to improve the university students’ quality of learning (e.g. Perälä & Ponkala 1998, Voutilainen 2001). Teaching and learning methods have been renewed for the purpose of helping students become actively involved in the learning process. One of these methods is the analysis of critical incidents (critical incident technique) that has been used for the purpose of connecting learning to the learner’s experiences (Brookfield 1990a, Parker et al 1995, Tossavainen et al 1998). Tripp (1993) assumes that the most promising means of improving teaching is basing educational research (thus theory) on the realities of teachers’ everyday experience as described by critical incidents. Smith and Russell (1991, 1993, 1998) have used the analysis of critical incidents in nurse education and suggest that this appears to be a useful strategy for increasing awareness of the complex skills of nursing and the dynamic interface between theory and practicum. Many other educators that have applied the analysis of critical incidents in their teaching have confirmed this (e.g. Brookfield 1990a, Obara et al 1993, Parker et al 1995, Rosenal 1995, Care 1996, Cooper 1996, Preskill 1997). Systematic evaluation, however, of the effective use of the analysis of critical incidents as a teaching and learning method is limited (Smith & Russell 1991, 1993, 1998, Presskill 1997, Hannigan 2001). There is a lack of educational research on critical incidents, therefore a more systematic and detailed evaluation is required to determine whether this type of learning experience does enable students to look at problems at a meaningful and relevant level (Tripp 1993, Minghella & Benson 1995, Rich & Parker 1995, Turunen et al 2001).

The use of the analysis of critical learning incidents as a teaching and learning method in nurse teacher education programs in Finland and in the United Kingdom was the purpose of this study. The study’s purpose was to investigate nurse student teachers’ experiences of becoming a reflective nurse teacher during the process of teaching practicum. The student teachers described the experiences of critical learning incidents in writing, which were then used as a base for reflective discussions in collaborative seminars during teacher training. Also evaluated was the appropriateness of the analysis of critical learning incidents as a teaching and learning method as a part of nurse student teacher studies. Former studies have focused on nurse teachers from various perspectives such as the nurse teacher’s role in

Additionally, Finnish, Swedish and Norwegian nurse teachers’ views of the core of nursing have been clarified (Janhonen 1992) as well as the Finnish nurse teachers’ views on nurse lectureship (Holopainen 1998). Teacher workload has been investigated in the United Kingdom (Cahill 1997) and in Finland (Harri 1997) as well as the organizational culture in the Finnish nursing colleges (Mäkisalo 1998) and Finnish, British and German nurse teachers’ requirements and the fulfillment of these (Salminen 2000). However, literature review indicates that fewer studies concern nurse teacher education (e.g. Leino-Kilpi & Suominen 1998). Studies of nurse teacher education have focused on the development of nurse student teachers’ reflective (Järvinen 1990) and scientific (Hyrykäs et al 1999, Sirkka et al 1999) thinking during their education. Nurse student teachers’ experiences of collaborative studies have been investigated (Tawse 1995, Tossavainen 1996, Tossavainen et al 1998) as well as experiences of teacher training (Talvitie 1996, Hakkarainen & Janhonen 1997, Hyrkäs et al 2001). However, no previous studies regarding the use of critical learning incidents as a teaching and learning method in the context of nurse teacher education exist. The aim of this study is to produce knowledge of this particular method to be applied in developing nurse teacher education further. This study belongs to the discipline of nursing science particular to the field of nursing education.

This study is a part of a large research and development project entitled: “The Development and Evaluation of Contents and Methods in Health Care Education”; a joint, collaborative project between the Department of Nursing Science, University of Kuopio in Finland and the Faculty of Health, Social Work and Education at the University of Northumbria at Newcastle in Great Britain. The main international project consists of three sub-projects focusing on: 1) collaborative learning; 2) the use of critical learning incidents as a teaching and learning method; 3) portfolios as a teaching and learning method (Tawse 1995, Tossavainen 1996, Tossavainen et al 1998, Turunen et al 2000a). The purpose of using the critical learning incident method in nurse teacher education programmes is threefold. Firstly, nurse student teachers learn the theoretical knowledge of the critical learning incident method; secondly, they gain experience using this particular method in their studies; and lastly, they have an
opportunity to critically examine their experiences on the use of the critical learning incident method in their studies. The long term educational goal is that nurse student teachers understand the theoretical thinking and action model of how to implement critical learning incidents in nursing education and in their future work as nurse teacher. In this manner they can help nurse students to examine experiences of nursing and compare them with existing knowledge of nursing.
2 REVIEW OF LITERATURE

2.1 Professional development to a nurse teacher

2.1.1 Reflection as a part of learning


However, according to Boud et al (1985) the concept of reflection in the context of teaching and learning is not a new one. Reflection can be found from Aristotle’s Discussions and more recently in the 1930’s in Dewey’s concept of reflective activity. Boud et al (1985) makes three points that are important concerning reflective learning. Firstly, only students themselves can learn and reflect on their own experiences; teachers can assist learning but students choose what they want to reveal of themselves therefore, the student is in complete control. Secondly, reflection is a purposeful activity directed towards goals. Lastly, reflection is a complex process in which both feelings and cognition are closely interrelated and interactive. Negative feelings, especially of oneself, can be barriers towards learning, whereas positive feelings can greatly promote the learning process.

In order to use reflection effectively, teachers need to (a) understand the conceptual issues and assumptions underpinning reflection and its limitations and (b) practice reflection in a planned and systematic manner (Calderhead & Gates 1993, James & Clark 1994, Scanlan & Chermonas 1997). It is important to recognize the need for structure and procedures that promote reflective practices (e.g. Calderhead & Gates 1993, Scanlan & Chermonas 1997, Durgahee 1998, Mallik 1998, Tossavainen et al 1998, Sirkka et al 1999).
Reflection as an active learning process has been described in different ways. Boud et al (1985) have represented the process of reflection whereby the focus is to enhance learning through strengthening the links between the learning experience and the reflective activity that follows the experience. This model consists of:

1) experiences;
2) the reflective process;
3) outcomes.

*Reflective process* refers to (a) returning to a previous experience by recollecting significant events; replaying the initial experience in the mind of the learner or describing to others the features of the experience; (b) attending to feelings by utilising positive and removing obstructing feelings; (c) re-evaluating experience, which involves re-examining experience from the learner’s goal; (d) associating new knowledge with the learner’s existing knowledge and (e) integrating this knowledge into the learner’s knowledge structure. According to Boud et al (1985, 34), “the *outcomes* of reflection may include a new way of doing something, the clarification of an issue, the development of a skill or resolution of the problem”. The outcomes of affective activities enable one to continue on to future learning and involve changes in emotions, attitudes and values. Reflection has been described as (a) the point in time when reflection happens to reflection-in-action and reflection-on-action (Schön 1987) and (b) the levels of cognitive processes achieved in reflection advancing from technical to critical reflection (Mezirow 1990). Mezirow (1990) emphasises critical reflection, meaning assessing the validity of presuppositions in prior learning. It requires a gap in which to reassess one’s meaning perspectives and, if necessary, transform them.

Critical reflection is not concerned with the how or how-to of the action but with why, the reasons for and consequences of doing. In learning this perspective, the collective or individual learner transforms. Perspective transformation is the process of becoming critically aware of how and why presuppositions have come to constrain the way of perceiving, understanding, and feeling about the world. Uncritical assimilated meaning perspectives determine what, how, and why one learns, may be transformed through critical reflection. Reflection on one’s own premises can lead to transformative learning. In communicative learning, meaning is validated through critical discourse. This reflective thinking process makes explicit what has been tacit and implicit and therefore, the process with co-learners can become very effective (Mezirow 1990, see also Järvinen 1990, Tossavainen 1996, Turunen et al 2000b). Transformative learning involves a particular
function of reflection: reassessing the presuppositions on which one's beliefs are based and acting on insights derived from the transformed meaning perspective that results from such reassessments. According to Mezirow (1990), emancipatory education is an organized effort to assist the learner by challenging presuppositions, explore alternative perspectives and transform old ways of understanding and act on these new perspectives.

Scanlan and Chermonas (1997) specify that the model of three stages seems to be most useful for nursing education. In this model, the first stage is awareness, the cornerstone of reflection. The second stage of reflection is that the individual critically analyse the situation. In the final stage of reflection, the individual develops a new perspective of the situation, transformed by the analysis. As a result of the process of reflection, learning occurs in the form of affective and/or cognitive changes with possible behavioural changes. (Figure 1)

![Diagram of Reflective Process](image)

**Figure 1. Reflective process** (Scanlan & Chermonas 1997)

A popular and known learning theory often used in adult education in which reflection is emphasised is Kolb’s (1984) experiential learning model. The experiential learning model involves a continuous process grounded on the individual’s experiences and transaction with one’s environment. Kolb’s model includes concrete experiences versus abstract conceptualisation and active experimentation versus reflective observation (Kolb 1984, Tynjälä 1999, Malinen 2000). According to Kolb (1984, 38) “learning is the process whereby knowledge is created through the transformation of the experience”. Similarly, Mezirow (1990) and Brookfield (1990b) point out the significance of the individual’s experience as a point of departure for reflective learning.

To summarize reflection is related to the experience; learning is related to relationships and personal interests; emotions and feelings have a pivotal role to play in intellectual reflective
learning (Kolb 1984, Boud et al. 1985, Mezirow 1990). Past experiences have both positive and negative effects that can either stimulate or hinder new learning. The present context acts to reinforce or counterbalance this (e.g. Boud 1985, LaBoskey 1993). Emotions and feelings are mostly neglected, particularly at the higher levels of educational institutions (Valli 1993, Tossavainen et al. 1998, Jarvis 1999).

2.1.2 Reflective nursing education

It is widely recognized that reflection is a key process in bringing together practical and theoretical knowledge in nursing and which has implications on the quality of care delivered (e.g. James & Clark 1994, Burrows 1995, Hallet 1997, Paget 2001) and also in the personal and professional growth of nurses (e.g. Hatton et al. 1994, Newell 1994, Sumson & Fleet 1996, Mallik 1998, Tossavainen & Turunen 1999, Jaroma 2000). Therefore, reflective skills are one of the goals nursing students have to achieve during professional education. Reflection is implied to be an increasingly valuable tool in nursing education that is used in order to analyze students’ clinical experiences systematically. According to Fagerberg (1998) nursing students’ learning process comprises both theoretical and practical parts in a profession that requires students to learn different subjects and skills in order to make the transition to their new profession. Their education is complex, consisting of combining theories, participating in training experiences and meeting patients in various situations. During the aforementioned, emotions can both facilitate and/or hinder learning.

Currently, a few studies are focusing only on reflection and the benefits of emphasizing reflective strategies in nursing education. In Shields’s (1995) study British nursing students (N=11) were interviewed about their views on writing about their experiences for the purpose of reflecting. Shields found that students valued reflection as a means of learning and that it led to a change in behaviour, enhanced awareness for problem-solving in personal and professional situations as well as improved patient care. Similarly, Mountford and Rogers (1996) found that formal reflection through individual writing and group discussion as a learning strategy influenced British students’ (N=50) educational outcomes and professional practice positively. Green and Holloway’s (1997) study established that for British nursing students (N=9) reflection was an integral element of experiential learning by recognizing how it contributed to their understanding of the theory-practice relationship. Durganee’s (1998)
study clarified British diploma course nurses' (N=110) experiences of facilitating reflection and the skills required by the teacher to make reflection a learning experience. Durgahee also found that facilitation is (a) making the learning purposeful, (b) continuous balance between confrontation and support, (c) providing an educational framework for students to make them active participants, (d) providing a framework for thinking, feeling and developing insight and (e) moving from unilateral to collaborative control (from sage to guide).

The levels (quality) of reflection of nursing students and nurses has been investigated in some studies. Richardson and Maltby (1995) found that second year British nursing students (N=30) reflected on their training mostly at the lower levels (94%) and only a little at higher levels of reflectivity. However, quite many of the students (73%) achieved the highest levels of reflectivity (conceptual and theoretical) but only in some issues. Similar results emerged in Eklund's (2000) study concerning Finnish nursing students' (N=22), nurse teachers' (N=6) and clinical nurses' (N=3) reflective learning in group situations during clinical practice. Only 7% of the reflection was at the higher level of critical reflectivity.

Nuutinen et al's (1998) study concerning Finnish nurses’ (N=28) levels of reflection on quality assurance showed that nurses reflected the structural factors of quality assurance at the lowest level of reflective thinking, whereas process and outcome factors were reflected at the highest level. However, Paget (2001) noticed in his study concerning British nurses' (N=200) views on how reflective practice had influenced their clinical practicum so that it was highly regarded as well as having significant long-term changes to clinical practice i.e. more effective in practice and delivery of nursing care.

Reflection is in general one of the goals of professional nursing education and although some evidence emerges to its benefits as a teaching and learning tool, there seem to be many unanswered questions. It appears that at the practical level, teaching and learning environments reflective practices need to be developed further. Mallik (1998), for instance, brought forth in her study that reflection was stated in nursing curricula, but there was evidence that it was non-operational in the everyday practice of teaching and learning in a way that made all the participants commit.

Durgahee (1996, 425) states, "it is not unusual that teachers bombard students with information, but starve them of knowledge". Durgahee emphasizes that teachers should use
strategies to help students transform information to knowledge. Knowledge is acquired when
the students reason logically and critically by differentiating the various elements of nursing
situations, gains insight into the situation to ascertain the issues and concerns, and uses this
insight as a basis for sound, deliberate and purposeful nursing practicum. This requires also
teacher education to be appraised so that student teachers develop the necessary skills to
facilitate reflective practicum for nurse educators are pivotal persons in developing reflective
nurses. A similar demand for nurse teachers and teacher education is pointed out by many
authors (e.g. Calderhead & Gates 1993, LaBoskey 1993, Hatton et al 1994, Glen et al 1995,

Some authors suggest that educators speak about reflection without really understanding what
it means. There is also a lack of research evidence concerning promotion of reflection in
education and its benefits in practice (e.g. Burnad 1995, Durgahee 1998, Ixer 1999, Hannigan
2001). Scanlan and Chermonas (1997) point out that being a reflective teacher means that
one:

1) Thinks reflectively about one’s own teaching,
2) models reflective thinking strategies and
3) uses specific teaching strategies that encourage students to be reflective.

All of the above are inter-related.

According to LaBoskey (1993) a reflective teacher must be able to:

1) Describe and analyze the structural features of an educational situation, issue, problem;
2) Define the problem;
3) Gather and evaluate information with the possible sources of the dilemma under
consideration;
4) Generate multiple alternative solutions and their potential implications (means/ends
analysis); and
5) Integrate all of the information into a conclusion or solution to the problem.

Although publications on reflection appear frequently, there is need for useable source
material of teaching and learning activities to be used in teacher education in order to promote
reflective teaching and learning (Järvinen 1990, Korthagen 1992). If one aim of the reflective
teacher education programs is to help student teachers become reflective teachers then the
objective of the activities is to teach them what it means to be reflective and how to implement (LaBoskey 1993). However, Järvinen (1990) investigated Finnish nurse student teachers’ development of reflective professional thinking during teacher education. Järvinen found that students chose target areas of reflection already at the beginning of their studies, which did not expand during teaching training but did achieve greater depth. The results show that nurse student teachers achieved all levels of reflective thinking, however not many at the highest level of critical awareness. The results emphasized the many challenges to nurse teacher education: during the teaching practicum reflective analysis should be focused on the contents of curricula, learning processes, and general educational issues instead of concentrating mainly on the teacher’s role. Teaching this means a change from technical competence to higher levels of professional competence.

Ability and attitude appear to be necessary for reflective thinking. Some students are unable to engage in the cognitive process of reflective thinking whilst others who had the necessary cognitive abilities have beliefs, values, attitudes or emotions that prevent or distort the reflective process in many situations (LaBoskey 1993, Valli 1993). Student teachers may be very stressed and have fears at the beginning of the teacher training that can be released through critical discussions with peers and supervising teachers (Talvitie 1996). Tossavainen et al’s (1998) study of Finnish (N=10) and British (N=8) nurse student teachers’ experiences of collaborative learning show that collaborative learning made it possible to have much discussion and thinking in developing professional and scientific knowledge and improved their understanding of knowledge. Discussions between students and teachers helped student teachers to understand and accept different ways, viewpoints and intellectual conflicts. Student teachers also learnt to shape and express their own thoughts and argue for themselves in the group.

In conclusion the former studies demonstrate that individual students (and nurses) vary in the extent to which they naturally reflect upon life experiences. Overall, students benefit from teaching and learning strategies that develop the skill of reflection. Moreover, the capacity to reflect is itself a development process that must be fostered through carefully phased activities, especially in relation to practical experiences. Increasingly demanding forms of critical reflection can be utilized to foster growth as an intending professional (see also Hatton et al 1994, Baker 1996).
2.2 Critical incidents as a teaching and learning method

2.2.1 Definitions of critical incident

The critical incident technique was first introduced by John F. Flanagan (1954) the developer of the Aviation Psychology Program of the United States Army Air Forces in World War II. He developed the critical incident technique by asking combat veterans to report their direct observations of their own or others’ behavior in the form of incidents that were significantly helpful or harmful to their bombing mission. Flanagan (1954, 327) defined the critical incident technique as follows:

“...The critical incident technique consists of a set of procedures for collecting direct observations of human behavior in such a way as to facilitate their potential usefulness in solving practical problems and developing broad psychological principles. The critical incident technique outlines procedures for collecting observed incidents having special significance and meeting systematically defined criteria.”

According to Flanagan’s definition an incident is any observable human activity that is entire to allow enough conclusions and forecasts to be made about the person carrying out the act. To be critical an incident must happen in a situation where the purpose of the act is clear to the observer and where its consequences are particular enough so that its effects can be understood (Flanagan 1954, Flanagan et al 1963, Fivars & Gosnell 1975). Moreover, a critical incident has been characterized as a sample of behavior that occurs in a situation where the intention of a person or the act is clear to the observer and there is little doubt about the behavior being effective or ineffective for completing the task. By means of critical incidents it is possible to identify critical job elements and also develop selection tests, training and evaluation procedures (Flanagan et al 1963).

Flanagan and his colleagues in psychology investigated different occupational groups such as airline pilots, research personnel and hourly wage employees in industrial situations. The participants were asked to describe their observations of other people’s acts or describe their own experiences of certain situations in order to determine the critical requirements for a
certain job or duty. The critical incident technique is determined especially as a procedure to collect particular pivotal facts concerning behaviour in defined situations. There are no strict rules for data collection, but there are two basic principles to be followed:

1) Reporting of the facts regarding behaviour and not a collection of interpretations, ratings, and opinions based on general impressions;

2) Reporting should be limited to those behaviours that make a significant contribution to the activity (Flanagan 1954, Flanagan et al 1963, Fivars & Gosnell 1975).

Critical incidents have been defined also differently (Table 1). Tripp (1993) emphasizes that incidents do happen but critical incidents are created, which means that to be critical the meaning of an incident is significantly valued. The term “critical incident” describes its historical bases referring to a certain event or situation which marked a significant turning point or change in the life of a person, an organization or in some social phenomenon (e.g. war). Usually these kind of critical incidents occur rarely in one’s lifetime that they alone cannot formulate an adequate basis for a professional research file. However, highly significant incidents occur more often and they have remarkable implications. Therefore, most critical incidents are not whatsoever dramatic, but they are everyday events in professional practicum. Consequently, highly significant incidents are more typical than critical ones but are turned into critical incidents through analysis.
Table 1. Definitions of critical incidents and critical events

<table>
<thead>
<tr>
<th>Author and field</th>
<th>Features of the definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flanagan (1954)</td>
<td>The critical incident technique</td>
</tr>
<tr>
<td>Psychology</td>
<td>any observable human activity</td>
</tr>
<tr>
<td>Critical requirements for a certain job</td>
<td>sample of behaviours which occur in a situation and are clearly observed</td>
</tr>
<tr>
<td></td>
<td>a procedure to collect pivotal facts of behaviour in a defined situation</td>
</tr>
<tr>
<td>Tripp (1993)</td>
<td>Incidents happen and critical incidents are created</td>
</tr>
<tr>
<td>Education</td>
<td>critical incidents are not dramatic but everyday events in professional practice</td>
</tr>
<tr>
<td>Learning method</td>
<td>incidents are more typical than critical; they are turned into critical through analysis</td>
</tr>
<tr>
<td>Education</td>
<td>critical incidents are unplanned, unanticipated and uncontrolled flash points</td>
</tr>
<tr>
<td>Learning method</td>
<td>critical events are intended, planned and controlled</td>
</tr>
<tr>
<td>Hollister (1996)</td>
<td>Traumatic critical incidents</td>
</tr>
<tr>
<td>Nursing</td>
<td>strongly affecting the person</td>
</tr>
<tr>
<td>Therapeutic debriefing</td>
<td>debriefing releases stress</td>
</tr>
</tbody>
</table>

Tripp (1993) adduces that there are two stages in the creation of critical incidents:

1) Some phenomenon is observed and noted, which produces a description of what happened. This stage can be called the production of an incident.

2) The authentic event is seen in a wider context. In this way it is possible explore a more general meaning if the incident is possible to analyse and understand in its specific context. The incidents only become critical because someone sees them as such. Therefore critical incidents are not simply observed, but are literally created.
Woods (1993, 1) examines the differences between critical incidents and critical events. He determines critical incidents as follows:

“Critical incidents are highly charged moments and episodes that have enormous consequences for personal change and development. They are unplanned, unanticipated and uncontrolled. They are flash points that illuminate some key problematic aspect or aspects of a teacher’s role, and which contain in the same instant the solution”.

Woods opinion is that there may be more such incidents during somehow critical periods, such as one’s initiation into teaching. Consequently, critical events are a related phenomenon between flash point incidents and the career phase periods. Critical events are integrated and focused programmes of educational activities that can last from some weeks to over a year. The difference between critical incidents and critical events is that unlike critical incidents, critical events are large scale, intended, planned and controlled. The characteristics of critical events in the context of teaching and learning are the methods to develop students’ own learning based on own needs, interests and relevancies. It changes and empowers the person (Woods 1993).

Critical incidents are used in relation to traumatic stress debriefing with the aim to release participants’ recently experienced traumatic situations. In this context critical incidents are greatly affecting the person and debriefing is assumed to be a therapeutic way to decrease the related stress (Hollister 1996).

In this study the term critical learning incident is used for the purpose of emphasizing the educational context of the study.

### 2.2.2 Critical incidents and experiential learning

Critical incidents as a teaching and learning method is based on the experiential learning theory (Kolb 1984, Mezirow 1990) with the purpose to promote students understanding and take control over educational experiences by reflecting on them critically (Brookfield 1990ab, Mallik 1998, Smith 1998, Tossavainen et al 1998, Tossavainen & Turunen 1999). Pivotal to
the process of critical reflection is the recognition and exploring of assumptions, which underlie in one’s thoughts and actions, because assumptions orientate one to perceive the world from a certain perspective. This perspective may also be quite narrow and therefore even an obstacle to learning something new. (Brookfield 1990ab, Mezirow 1990, Rich & Parker 1995, Törnä 2001) In order for learning to take place it is the central task of critical education to make explicit the components of the assumptive world of students (Wodlinger 1990, Smith 1998). When doing this, educators must act with care and sensitivity. The students’ self-esteem is not to be reduced in the process (Brookfield 1990a). Consequently, in a communicative learning situation it is essential that the teacher has both ability and confidence to deal with the different results of the reflection process whereby to ensure safety and meaningful learning (Sims 1976, Wodlinger 1990, Rich & Parker 1995, Silkelä 2001, Törnä 2001).

Many authors state (e.g. Smith & Russell 1993, 1998, Jasper 1995, Parker et al 1995) that the analysis of critical incidents is a valuable educational tool in the field of nursing education. Analysis of critical incidents enables nursing students to draw on their own unique past experiences and understand them by analyzing from a theoretical perspective. By re-integrating existing knowledge with new knowledge they identify implications for future personal and professional practice by the development of the knowledge, skills and attitudes required of an effective practitioner. (Smith & Russell 1993, 1998, Jasper 1995, Parker et al 1995) Hence it is suggested that if there is a case for the individual approach in provision of nursing care, there is also a case for using experiential learning strategies within the field of nursing education. (Parker et al 1995, Tossavainen & Turunen 1999) It is recognized though that experience itself does not necessarily lead to learning, but that experience needs to be critically reflected (Proctor & Reed 1993, Smith & Russell 1993).

According to Brookfield (1996), taking into account of students’ experiences is one of the most important principles of experiential education. However getting inside a student’s head is one of the trickiest tasks and most crucial task of any teacher. Also, Brookfield declares that some awareness of how students experience learning is fundamental and the first undertaking for teachers. In addition critical incidents are worthy in identifying learning needs (Rosenal 1995, Care 1996, Perry 1997). The critical incident technique is related to the phenomenological research tradition because the aim is to describe the lived experiences and to solve from a single experience the generic meanings, which are common to many people.
However, when students are instructed to describe their critical incidents they are expected to be idiographic rather than nomothetic. This means that the data of critical incidents represents students’ existential realities and becoming more aware of the realities existing in students’ practice benefits the educators as well. (Brookfield 1990a, Rosenal 1995)

A literature review of critical incidents in an educational context shows that there is a lack of research. Also is a lack of practical educational descriptions concerning critical incidents as a teaching and learning method and educational research where critical incidents have been used as a data collection method. Some research (Appendix 1) has concentrated on evaluating critical incidents as a teaching and learning method in the teacher (Wodlinger 1990, Cooper 1996, Preskill 1997) and nursing education (Sims 1976, Dachelet et al 1981, Mingella & Benson 1995). The results of these studies indicate that critical incidents as a teaching and learning method have proved to be valuable in enhancing students’ involvement in the learning process (Sims 1976, Mingella & Benson 1995, Preskill 1997) and integrating theoretical and practical knowledge (Mingella & Benson 1995). The written critical incidents and guided reflection sessions have proved to be meaningful for student teachers development (Wodlinger 1990). In addition the use of critical incidents has given a broad picture of the students’ reality and how students perceive learning (Dachelet et al 1981, Cooper 1996). The challenges concerning the use of critical incidents as a teaching and learning method express a wide variation between students in the extent of specificity of reporting incidents (Dachelet et al 1981) and the ethics of commenting negatively on other students (Preskill 1997).

In former studies of nursing education critical incidents have been used as a data collection method to clarify students’ perceptions of teacher’s facilitating and hindering behavior in clinical practice (Wong 1978); stressful clinical and didactic situations in nurse education (Lee 1987); students’ feelings about their situation as a student (Pillhammar 1995); early nursing experiences (Wong & Lee 2000). Smith (1998) used critical incidents in a study focusing on describing the ways in which nurse students reflect on their practicum. From the perspective of continuing education, nurses’ work life has been investigated (Perry 1997) as well as their learning needs at work (Care 1996). Results indicate that the areas of education to focus on are conflict management and teamwork. In teacher education Obara et al (1993) have used critical incidents for the purpose of understanding students’ teaching situations. Kain’s (1997) study focused on the conditions encouraging and discouraging teacher collaboration, which showed that time, the training teachers had received and support
provided by the organization were supporting factors for teacher collaboration, whereas lack of support, pressures to cover curriculum and conduct testing as well as traditions of tracking and separate-subject instructions were discouraging factors on teacher collaboration.

The descriptions of practical educational designs adduce that the creation of critical incidents as a teaching and learning method includes two phases. Firstly, the phenomenon is observed and noted, which then produces a description of what occurred. Secondly, the critical incidents are analysed. By writing down the incident, the writer is able to reflect upon their experiences, and having the incident written down it is then possible to show and discuss it with other students. It has been assumed that a written description is important because it encourages analysing in a deeper and more objective way compared to spontaneously verbally recalling past thoughts and events (Tripp 1993, Woods 1993). In teacher education Brookfield (1990ab) used a critical incident questionnaire, which contained a series of open-ended questions concerning specific positive and negative events, including details of time, place, persons who were involved and the reasons why the incident was so significant, rather than asking general observations about the nature of teaching. The aim is to have returned a very well written description of an incident that the reader can re-imagine the original situation during their teacher studies. To describe one a positive and another a negative event creates a basis for getting a more complete picture of the participants' assumptive worlds. However, it is also important that critical incidents facilitate the sharing of knowledge with others in a planned and systematic way. Moreover, one way to broaden and verify one's experiences is to compare them with the results of published research findings. Analysed critical incidents that have been assessed have been included as a part of student portfolios (Brookfield 1990a, Jasper 1995, Mingella & Benson 1995).

Smith and Russell (1993) have applied critical incident analysis by asking student nurses to describe critical incidents anonymously in written form. The incidents are given to teaching staff two or three days before a workshop convenes in order to give teachers time to categorise the critical incidents: looking for common themes or concerns and researches. A unique incident may be used then if it is deemed to provide an opportunity for particular learning. The authors have noticed that during workshops the concepts are reapplied to meaningful situations, the gap in knowledge is uncovered, and the lack of understanding or misapprehensions is identified.
The analysis of critical incidents as a teaching and learning method has been used while nurse students have studied to care for the dying. The analysis of critical incidents seems to help students become aware of their thoughts, feelings and beliefs and in that way helps students to act effectively as health care professionals (Paech 1997, Ramdsen 1997, McDonnell-Baum 1998). Other practical educational designs have focused on the use of critical incident scenarios as the final assessment of a midwifery programme (Westwood-Timms 1995); to develop nurses’ analysis skills (Crouch 1991); educating multidisciplinary teams working in primary health care (Howkins & Allison 1997).

Rich and Parker (1995) observed that the critical incidents their students have described have important implications for the quality of care given within the wards and thus affect patients, relatives, staff and investors of health care. Some of the incidents appear to be so challenging that they create a great deal of uncontrolled emotion in that cathartic support will be needed before an attempt to think positively or constructively becomes possible. There is also the moral issue as to whether teachers should encourage students to expose themselves without knowing much about the students’ past experiences and possible unresolved conflicts. Therefore, the reflection of critical incidents should always be guided and ground rules must be identified, internalised and agreed upon by students prior to the setting out structured, systematic, personal and professionally focused reflection. It is important that teachers are able to resolve conflicts and dilemmas arising from student reflection in a safe, controlled environment with supportive peer support and supervision. Exploring these issues therefore needs to be handled by a skilled teacher with the appropriate knowledge and skills in this area (Brookfield 1990a, Mezirow 1990, Smith & Russell 1993, Rich & Parker 1995). In addition, Hargreaves (1997) suggests the need to consider from an ethical point of view the use of critical incidents, among other experiential teaching and learning methods, as a basis for learning. One should consider whether the description of experience (critical incident) might include information of persons who have no knowledge that they are included, even anonymously, in incidents that may be used in public learning situations.

2.3 Critical incidents in developing nursing knowledge

Many nursing researchers have used the critical incident technique (CIT) as a data collection method to investigate the aspects of nursing practice (Appendix 2). The range of topics that
have been studied indicates the flexibility of the CIT and is one reason for its increasing popularity (Norman et al 1992). The critical incident technique has been used to describe nurses’ perception of their psychological role in treating rehabilitation patients (Rimon 1979); nurses’ competency level in clinical practice (Benner 1984); nursing quality of care (Cox et al 1993, Beech & Norman 1995, Grant et al 1996, Koponen et al 2000ab); care of the elderly (Reed 1994, Cheek et al 1997); preoperative nursing (Post 1996, Silén-Lipponen et al 1998); community nursing (Timpka et al 1996, Malin 2000); emergency nursing (Burns & Harm 1993, Wahlin et al 1995); oncology nursing (Cohen & Sarter 1992); humour (Struthers 1999) and aggressive ward visitor (Laight 1995). In addition, the critical incident technique has been used in investigating the factors influencing compliance with prescribed treatment in patients with chronic hearth failure (Strömber et al 1999); how nurses can be effective advocates for patients (Martin 1998a); nurses’ experiences of the need to empower dying patients (Martin 1998b); identifying behavioural responses of hospitalised patients with HIV/AIDS (Kemppainen et al 1998) and in developing a concept analysis of control for use in children and young people’s mental health nursing (Croom et al 2000). In these studies the critical incident technique has been found appropriate to develop nursing knowledge.

2.4 Summary of the theoretical perspectives of the study

To summarise, current theories of adult teaching and learning emphasise the learners’ experiences as a starting point for learning something new (Figure 2). Learning environments have to be structured so that learners have an opportunity to use their former experiences.

From the point of view of reflective learning this is also very important, because former negative experiences may be obstacles for learning new issues. Therefore in a learning situation experiences are re-evaluated for the purpose of becoming aware of one’s own a priori knowledge and assumption concerning the issue under study. To learn something new a comparison between learner’s knowledge and other existing knowledge (co-learners, research and other literature) is made. In this process the learner learns new concepts and thus the conceptual thinking as well as intellectual skills such as critical thinking develop. The learner develops a personal theory of the topic under study, uses it and tests how it works in practice. The learning process continues by examining the experiences as to appropriateness and how the formulated personal theory was in practice.
Learning happens individually, which means changes in the learner’s knowledge structure. Current educational research emphasises, however, the importance of co-learners in the learning process. Co-learners are seen in the context of having the opportunity to compare one’s experiences and argument one’s views with another. This means becoming aware of one’s views and opinions explicitly. Learning is seen as a process whereby the learner constructs one’s own knowledge base by examining personal existing knowledge with views of co-learners and existing literature. This leads to transformation in the learner’s knowledge structure by enlarging and deepening personal views, which influences the learner’s cognitive, affective and behavioural changes.
3 AIMS OF THE STUDY

The purpose of this study was to investigate Finnish and British nurse student teachers’ experiences of becoming a reflective nurse teacher during the process of teaching practicum through written form employing critical learning incidents. Their experiences of using the critical learning incidents as a basis of reflective collaborative discussion in teaching practicum seminars followed. The purpose was to identify strategies to further develop nurse teacher education.

The aims of the present study were:

1) To describe nurse student teachers’ critical learning incidents concerning their teaching practicum.
2) To describe the use of analysis of critical learning incidents as a nurse student teachers’ teaching and learning method in reflection seminars during teacher practicum.
3) To compare the similarities and differences in experiences of Finnish and British nurse student teachers.
4 DATA COLLECTION AND METHODS

4.1 Context of the present study

This study examines Finnish and British nurse student teachers’ experiences of becoming a reflective nurse teacher during the process of teaching practicum through critical learning incidents. In addition, their experiences of using the critical learning incidents as a basis of reflective collaborative discussion in teaching practicum seminars were described. The context for this study was the Nurse Teacher Education programmes at the University of Kuopio, Department of Nursing Science, Finland and University of Northumbria at Newcastle, Faculty of Health, Social Work and Education, United Kingdom. From the beginning of 1993 these universities have been cooperating in the areas of teaching and research in their nurse teacher education programmes (Tawse 1995, Tossavainen 1996). In Finland the nurse teacher degree is a Master in Nursing Science that includes pedagogical studies (at least 35 credit units, 52 ECTS units; of that 10 credit units, 15 ECTS teaching practicum). The requirements for pursuing nurse teacher studies in Finland are a health care degree at the current polytechnic level (Tossavainen 1999b). In the United Kingdom the United Kingdom Central Council for Nursing, Midwifery and Health Visiting (UKCC) set standards for the preparation of both lecturers and practical teachers of nursing, midwifery and health visiting and are approved by the National Board for Nursing, Midwifery and Health Visiting (UKCC 2000). There the teacher-training programme is implemented at university level and is a bachelor’s degree (can be continued towards a Masters degree) including theoretical and practical studies of teaching and learning which includes two, twelve-week, full-time training practicum. Those who want to study to be a nurse teacher in the UK should be registered practitioners in health care and have completed a minimum of three years full-time experience in a relevant health profession practise during the past ten years.

The experiential learning theory including the reflection process formulates the structure for learning in nurse teacher education in both universities (Tawse 1995, Tossavainen 1996). In that learning process the contents of education are the experiences that student teachers experience as significant in the collaborative learning during the teaching practicum. The
particular learning method used to foster nurse student teachers’ reflective thinking is the analysis of critical learning incidents.

4.2 Data collection

Data was collected between 1996 and 1998 from Finnish (N=25) and British (N=17) nurse student teachers participating in their first and second teaching practicum. As a part of their studies nurse student teachers described critical learning incidents in a written form about their experiences during the teaching practicum. Part of the data of this study was formulated from the critical learning incidents written by nurse student teachers (Appendix 3). These written critical learning incidents were reflected upon in seminars held following the conclusion of the teaching practicum. In Finland the critical learning incidents were used anonymously in collaborative reflection seminars following the protocol presented by Smith and Russell (1991). The Finnish nurse student teachers returned their written critical learning incidents to tutors, who selected four of the incidents to become reflected on during seminars. In the UK implementation differed from the Finnish in that after writing critical learning incidents, students shared their incident with a three to four student members’ peer group.

Interviews were given after the seminars. Twenty students participated in the interviews. At the conclusion of the first teaching practicum seminar six Finnish students and four British students were interviewed. The same number of students was interviewed in both countries after the second teaching practicum seminar. The interviewed students were in both cases from the same nurse student teacher group, but not the same individuals. In Finland, the student teachers that participated in the seminars were raffled for interviews, whereas in the United Kingdom willing students were asked for interviews by the co-researcher. In both countries, all the students who participated in this study were volunteers. The purpose of the interviews was to discover student teachers’ experiences of sharing critical learning incidents with peers and tutors and reflecting on them in a collaborative learning situation. Finnish students wrote their critical learning incidents in Finnish and were interviewed in Finnish by the author, whereas British students wrote their critical learning incidents in English and were interviewed in English by a native English speaking co-researcher.
Altogether, 138 critical learning incidents (seventy positive and sixty-eight negative) were collected. They described in detail nurse student teachers’ practicum experiences. Norman et al (1992) state that in a study where data is collected by critical incidents, the number of incidents collected, and not the number of people, determines the sample size. The more complex the general aim of the activity the more incidents required to make the study reliable. According to Norman et al (1992) it is difficult to determine beforehand how many incidents are needed but recommend a minimum of one hundred incidents. In this study the minimum was met: 138 incidents recorded with 227 written pages interview data by word-processing. (Table 2) The criteria for classifying the critical learning incidents as positive and negative for the data analysis based on nurse student teachers’ original description: those critical incidents that nurse student teachers had described in a written form of positive critical incident was classified as positive. The negative critical learning incidents were classified according to same criteria.

Table 2. Data collection of the study

<table>
<thead>
<tr>
<th>Nurse student teachers</th>
<th>Written descriptions</th>
<th>Interviews</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(number of positive and negative critical learning incidents, number of pages of data)</td>
<td>(n = number of students in the seminar, number of pages of data)</td>
</tr>
<tr>
<td><strong>Teaching practicum I (year 1996)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Finnish (N=25)</td>
<td>21+20 =41 (46 pages)</td>
<td>6 (n=19, 97 pages)</td>
</tr>
<tr>
<td>British (N=17)</td>
<td>11+11 =22 (24 pages)</td>
<td>4 (n=11, 24 pages)</td>
</tr>
<tr>
<td><strong>Teaching practicum II (years 1997-1998)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Finnish (N=25)</td>
<td>23+22 =45 (51 pages)</td>
<td>6 (n=18, 97 pages)</td>
</tr>
<tr>
<td>British (N=17)</td>
<td>15+15 =30 (30 pages)</td>
<td>4 (n=15, 17 pages)</td>
</tr>
<tr>
<td><strong>Together</strong></td>
<td><strong>138 (151 pages)</strong></td>
<td><strong>20 (227 pages)</strong></td>
</tr>
</tbody>
</table>

4.3 Descriptive phenomenological method and its application in this study

The data of this study was analysed using the descriptive phenomenological method developed by Giorgi (1985ab, 1992, 1994, 2000ab). Giorgi developed this method for psychological research, but later has been applied frequently in nursing research (e.g. Fagerberg & Ekman 1997, Turunen 1997, Silén-Lipponen et al 1998, 2001, Purola &
Aavarinne 2001). The method has its epistemological and ontological roots in Husserl’s phenomenology that contain some principles which should be taken into account when doing phenomenological research. Husserl’s aim was to “go back to the things themselves” and describe the lived experience, as it appears in one’s consciousness in an intentional relationship of consciousness and object (real i.e. table or ir-real i.e. fear). One of the pivotal principles of Husserlian phenomenology is description, which means that the phenomenon under investigation has to be described as precisely as it presents itself to human consciousness. According to Giorgi (1997), “to describe means to give linguistic expression to the object of any given act precisely as it appears within that act”. Therefore, description demands to limit itself to what is given to the consciousness in experience. Accordingly, interpretation does not belong to descriptive phenomenology.

The second principle is phenomenological reduction, which means giving up the natural attitude to being in the world and enables one to grasp things as they present themselves to consciousness. In addition the other demand of phenomenological reduction is that one should reflect upon and bracket all past theories and knowledge about the phenomenon one is encountering. Bracketing is an important task in order to enable a given object to present itself in its fullness in the situation (Giorgi 1997, 2000a, Perttula 1998). Search for essences means that the process of free imaginative variation is used to find out the essential (invariant) characteristics of the phenomenon. Imaginative variation means that the aspects of the concrete phenomenon are varied until essential characteristics show themselves. This process in Husserlian phenomenology is also known as eidetic reduction (Juntunen 1986, Paley 1997). Giorgi (1997) states that “whatever is given factually becomes one example of a possible instance of a phenomenon, and by multiplying possibilities one becomes aware of those features that cannot be removed and thus what is essential for the object to be given to consciousness”.

In Giorgi’s method, description is the basic principle and the goal of the data analysis. The method consists of five essential phases as follows (Table 3):

1) One reads the original description in order to get a sense of the whole;
2) Once the meaning units have been discriminated;
3) they will be transformed into the language of the discipline with emphasis on the phenomenon being investigated. The transformation will be made through a process
of reflection and imaginative variation. The transformation is made to change the description from the participant's natural attitude into the language of the discipline;

Table 3. The progress of descriptive phenomenological analysis method developed by Giorgi (1985ab)

<table>
<thead>
<tr>
<th>PHASE 1</th>
<th>PHASE 2</th>
<th>PHASE 3</th>
<th>PHASE 4</th>
<th>PHASE 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Analysis at one participant's level</td>
<td>Analysis at the level of all participants</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Raw data</td>
<td>Dividing the data</td>
<td>Search for essences of the meaning units</td>
<td>Synthesis of the transformed meaning units into a consistent statement</td>
<td>Synthesis of all the participants' specific descriptions of situated structures</td>
</tr>
<tr>
<td>A sense of the whole experience</td>
<td>Discriminated meaning units</td>
<td>Transformed meaning units</td>
<td>Specific description of situated structure</td>
<td>General structural description or types of general structural descriptions</td>
</tr>
</tbody>
</table>

4) The researcher then synthesizes the transformed meaning units into a consistent statement, the specific description of a situated structure, considering the participant's experience. However, the transformed meaning units can differ in their richness in describing the phenomenon. Despite that, all the transformed meaning units must be considered, so that they are contained in the structure. In practice fewer descriptive meaning units are included in rich ones with the same content (Giorgi 1985ab);

5) Finally all the participants’ specific descriptions of situated structures are integrated together as a general structure. If it is not possible to integrate the participants' descriptions because of different meanings, several types of general structures will be synthesized (Giorgi 1985ab). Different types of general structures can contain partly the same kind of meanings, but they always contain different essential meanings, too, and that is the reason why types are developed.

Critical incidents have been found to be an appropriate method to collect data in phenomenological investigations because critical incidents describe concrete and situated
experiences. This is the basic demand for data in phenomenological research (Giorgi 1985a, Reed 1994). In this study the data gathered from the written versions of critical learning incidents as well as from the interviews was read carefully through several times in order to exact the contents. The next three phases proceed at the individual participant level. Each critical learning incident and interview data of nurse student teachers experiences were at the individual participant level and divided into meaning units. The meaning units were reflected upon with the aim to ascertain the meaning and then to describe the meaning through the terms of educational science, in this case nursing didactics. The perspective for dividing the data into meaning units and transforming the meaning units into the language of the discipline came from research interest, which was to examine student teachers' experiences of their growth towards nurse teacher and of the use of an experiential (analysis of critical learning incidents) learning method during their teaching practicum. After that the transformed meaning units were linked to each other in order to describe a specific description of situated structure of a single participant of the study and was presented as a meaning map.

Finally, all specific description of situated structures (meaning maps) was examined in order to find out whether they all contained same meanings and when they all could be included in the same general structure. In this study it emerged that different specific descriptions of situated structures included different meanings, therefore, different types of general structural descriptions were formulated. Examples of the progress of the analyses of a written critical learning incident concerning both Finnish and British student are given in Appendix 4 - 5. Similarly, examples of the progress of the analyses of interview data are represented in Appendix 6 - 7.
5 RESULTS

The results of this study are types that formulated on the base of nurse student teachers’ experiences and they describe the essential structure of becoming a nurse teacher in the teaching practicum context, where critical learning incidents are used as a teaching and learning method.

5.1 Types of critical learning incidents of nurse student teachers

5.1.1 Types of positive critical learning incidents (PCLI Type 1-) of nurse student teachers during the first teaching practicum

Table 4 shows the results of positive critical learning incidents of nurse student teachers’ during the first teaching practicum. Altogether, seven different Types could be recognized from student teachers’ experiences.

**Table 4. Types of positive critical learning incidents (PCLI Type 1-) of nurse student teachers during the first teaching practicum**

<table>
<thead>
<tr>
<th>FINNISH STUDENTS</th>
<th>BRITISH STUDENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>I) Mentor’s collegial attitude towards organizing learning opportunities strengthening student teacher’s identity as a teacher and motivation to develop self.</td>
<td>I) Mentor’s collegial attitude towards organizing learning opportunities strengthening student teacher’s identity as a teacher and motivation to develop self.</td>
</tr>
<tr>
<td>II) Realistic mentor as a positive role model towards prospective working life.</td>
<td>II) Mentor as a positive role model for teacher - student relationship.</td>
</tr>
<tr>
<td></td>
<td>IV) Understanding teacher’s need to continuously develop oneself as a teacher.</td>
</tr>
</tbody>
</table>
A common PCLI Type to both Finnish and British student teachers was I-I) "mentor’s collegial attitude towards organizing learning opportunities strengthening student teacher’s identity as a teacher and motivation to develop self”.

Two other Types described Finnish nurse student teachers’ experiences as follows: I-II) “realistic mentor as a positive role model towards prospective working life” and I-III) “collaboration as a safe model to solve conflicts”. Three other Types of British nurse student teachers experiences were I-II)”mentor as a positive role model for teacher - student relationship”, I-III) “formulation of a personal theory of teaching and learning” and I-IV) “understanding teacher’s need to continuously develop oneself as a teacher”.

Types of positive critical learning incidents (PCLI Type I-) of Finnish nurse student teachers

PCLI TYPE I-I: MENTOR’S COLLEGIAL ATTITUDE TOWARDS ORGANIZING LEARNING OPPORTUNITIES STRENGTHENING STUDENT TEACHER’S IDENTITY AS A TEACHER AND MOTIVATION TO DEVELOP SELF
Mentors’ collegial attitude towards student teacher and taking account of the student teachers learning goals promotes the development of personal teacher identity and motivates the student teacher to study further.

PCLI TYPE I-II: REALISTIC MENTOR AS A POSITIVE ROLE MODEL TOWARDS PROSPECTIVE WORKING LIFE
Mentor’s reality based descriptions of content; demands and strategies to administrate teacher’s work act as a positive role model for the student teacher.

PCLI TYPE I-III: COLLABORATION AS A SAFE MODEL TO SOLVE CONFLICTS
Conversations about collaborative studies and tutoring of process conflicts, which belong to collaborative studies, promote student teachers collaboration and help them learn how to solve conflicts.
Types of positive critical learning incidents (PCLI Type I-) of British nurse student teachers

**PCLI TYPE I-I: MENTOR’S COLLEGIAL ATTITUDE TOWARDS ORGANIZING LEARNING OPPORTUNITIES STRENGTHENING STUDENT TEACHER’S IDENTITY AS A TEACHER AND MOTIVATION TO DEVELOP SELF**

The mentor’s role is significant at the beginning of the student teacher’s teaching practicum. Support is demonstrated by the mentor being prepared to meet the student teacher and plan the studies together by reserving time for analysing the student teacher’s learning needs and thinking about opportunities that student teachers might be interested in. The mentor’s feedback during the teaching practicum and collegial attitude towards the student teacher increases student teacher’s self-confidence as a prospective teacher.

**PCLI TYPE I-II: MENTOR AS POSITIVE ROLE MODEL FOR TEACHER – STUDENT RELATIONSHIP**

The mentor is a significant role model for the student teacher by showing how to develop a confidential relationship between the teacher and students through openly discussing the ground rules of teaching and learning session and by using student-centred teaching and learning methods. The mentor may also promote ways to view subjects from different perspectives and accept different opinions.

**PCLI TYPE I-III: FORMULATION OF A PERSONAL THEORY OF TEACHING AND LEARNING**

In a learning situation where adult students arrive late a student teacher experiences conflict between her personal theories about adult learners’ own responsibility and personal feelings of irritation. The student teacher begins to reform one’s personal idealistic theory about adult learners (adult learning theories) based on personal real life experiences in the teaching practicum.

**PCLI TYPE I-IV: UNDERSTANDING TEACHERS’ NEED TO CONTINUOUSLY DEVELOP ONESELF AS A TEACHER**

The student teacher’s images of qualified teachers as an all-knowing person changes and becomes aware of teachers being lifelong learners by participating in a teachers’ meeting where teachers discuss their learning needs quite openly and collaboratively.
5.1.2 Types of negative critical learning incidents (NCLI Type I-) of nurse student teachers during the first teaching practicum

During their first teaching practicum nurse student teachers met negative experiences of which seven different Types were found amongst both Finnish and British student teachers. (Table 5) Finnish student teachers Types were I-I) uncollegial mentor, I-II) mentor’s negative description of the nurse teacher’s work, I-III) problems in collaborating with the mentor, I-IV) mentor’s inability to manage with disturbance caused by nurse students, I-V) problems in collaborative studies, I-VI) mentor’s unwillingness for continuing education because of a temporary decrease in salary and I-VII) dissatisfaction with organizing the studies.

Table 5. Types of negative critical learning incidents (NCLI Type I-) of nurse student teachers during the first teaching practicum

<table>
<thead>
<tr>
<th>FINNISH STUDENTS</th>
<th>BRITISH STUDENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>I) Uncollegial mentor.</td>
<td>I) Teacher-centred teaching style not taking account of students’ views.</td>
</tr>
<tr>
<td>II) Mentor’s negative description of the nurse teacher’s work.</td>
<td>II) Problems in collegial relationship between mentors.</td>
</tr>
<tr>
<td>III) Problems in collaborating with the mentor.</td>
<td>III) Participants neglecting to participate in student teachers’ session.</td>
</tr>
<tr>
<td>IV) Mentor’s inability to manage with disturbance caused by nurse students.</td>
<td>IV) Unrealistic learning goals concerning students’ abilities.</td>
</tr>
<tr>
<td>V) Problems in collaborative studies.</td>
<td>V) Lack of confidence to give feedback on development needs.</td>
</tr>
<tr>
<td>VI) Mentor’s unwillingness for continuing education because of a temporary decrease of salary.</td>
<td>VI) Closed organization culture and routine atmosphere.</td>
</tr>
<tr>
<td>VII) Dissatisfaction with organizing the studies.</td>
<td>VII) Poor quality of physical learning environment.</td>
</tr>
</tbody>
</table>

British Types of negative critical learning incidents were I-I) teacher-centred teaching style not taking account of students’ views, I-II) problems in collegial relationship between
mentors, I-III) participants neglecting to participate in student teachers’ session, I-IV) unrealistic learning goals concerning students’ abilities, I-V) lack of confidence to give feedback on development needs, I-VI) closed organization culture and routine atmosphere and I-VI) poor quality of physical learning environment.

Types of negative critical learning incidents (NCLI Type I) of Finnish nurse student teachers

NCLI TYPE I-I: UNCOLLEGIAL MENTOR
Mentor’s uncollegiality towards the student teacher and underestimation of the lack of student teacher’s working experience causes uncertainty and decrease of self-esteem.

NCLI TYPE I-II: MENTOR’S NEGATIVE DESCRIPTION OF THE NURSE TEACHER’S WORK
Mentor’s negative description of the demands of the nurse teacher’s work and suspicion of the student teacher’s unrealistic views on teacher’s work cause the student teacher to consider if there is any sense in her studies, but also the strategies on how to manage with teacher’s work appropriately.

NCLI TYPE I-III: PROBLEMS IN COLLABORATING WITH MENTOR
Problems in the relationship between the student teacher and mentor appear because the mentor has not prepared herself for the meetings that are planned beforehand, and because the mentor is busy and her attitude towards the student teacher is unequal and stiff.

NCLI TYPE I-IV: MENTOR’S INABILITY TO MANAGE WITH DISTURBANCE CAUSED BY NURSE STUDENTS
The student teacher becomes anxious about the mentor’s inability to manage with disturbance caused by nurse students and about the mentor’s lack of self-esteem.

NCLI TYPE I-V: PROBLEMS IN COLLABORATIVE STUDIES
Intolerant atmosphere in the collaborative study group and students’ different levels of commitment for achieving the learning goals do not support the student teacher’s development as a teacher.
NCLI TYPE I-VI: MENTOR'S UNWILLINGNESS FOR CONTINUING EDUCATION BECAUSE OF A TEMPORARY DECREASE IN SALARY
The student teacher is unwilling to become familiar with her mentor and has feelings of uncertainty because of the mentor's unwillingness to keep her clinical knowledge up to date due to a temporary decrease of salary.

NCLI TYPE I-VII: DISSATISFACTION WITH ORGANIZING THE STUDIES
A program too busy during the introduction phase for the teaching practicum environment causes dissatisfaction, since there is not enough time for discussions between the student teacher and the mentor.

Types of negative critical learning incidents (NCLI Type I-) of British nurse student teachers

NCLI TYPE I-I: TEACHER-CENTRED TEACHING STYLE NOT TAKING ACCOUNT OF STUDENTS' VIEWS
The student teacher considers the appropriateness of a session from the point of view of students' learning where the teacher uses a teacher centred teaching method without making explicit the goals of the session or summarizing the content of it.

NCLI TYPE I-II: PROBLEMS IN COLLEGIAL RELATIONSHIP BETWEEN MENTORS
Problems in collegial relationship between mentors themselves caused by inability to receive feedback from colleagues and uncollegial attitude towards the student teacher are unpleasant and the student teacher starts to consider the meaning of behaving and debating professionally.

NCLI TYPE I-III: PARTICIPANTS NEGLECTING TO PARTICIPATE IN STUDENT TEACHER'S SESSION
The student teacher feels uncertain as a teacher in a new teaching environment especially because participants do not express clearly their interest in participating in the student teacher's teaching session.
NCLI TYPE I-IV: UNREALISTIC LEARNING GOALS CONCERNING STUDENTS’ ABILITIES
The student teacher learns about the need to assess students’ learning goals and appropriate teaching and learning methods to foster the achievement of these goals. The student teacher becomes aware of this in a situation where the nurse students’ learning goals are not achieved and the nurse students do not learn the necessary subject matter.

NCLI TYPE I-V: LACK OF CONFIDENCE TO GIVE FEEDBACK ON DEVELOPMENT NEEDS
The student teacher becomes aware of own fear to give feedback especially on topics that include a development need for a student. Student teacher recognizes one’s own need to develop in giving constructive feedback by preparing beforehand to know the subject of feedback and thus give meaningful feedback to students.

NCLI TYPE I-VI: CLOSED ORGANIZATION CULTURE AND ROUTINE ATMOSPHERE
The student teacher feels the organizational culture in an educational institute inflexible and closed. Members of the organization seem to participate in meetings more for habit’s sake than for real interest and willingness to actively partake in the meeting.

NCLI TYPE I-VII: POOR QUALITY OF PHYSICAL LEARNING ENVIRONMENT
Too low temperature in the learning environment and the inability to resolve it can effectively hinder any process of learning and frustrate the student teacher.

5.1.3 Types of positive critical learning incidents of nurse student teachers during the second teaching practicum (PCLI Type II- )
Table 6 represents the Types based on Finnish and British students’ experiences during the second teaching practicum. A common Type for Finnish and British nurse student teachers was II-I) “team teaching with peers”.

Additional Finnish nurse student teachers’ Types were II-II) “importance of peer assessment”, II-III) “the joy of learning towards teacher hood”, II-IV) “significance of the
mentor’s and tutor’s support” and II-V) “learning to manage with serious pre-teaching stress”. Additional Types of British students’ were II-II) “careful preparation before a teaching session”, II-III) “continuity as a facilitator to the development of student teacher – student nurse relationship”, II-IV) “collegial support creates the feeling of being a team member” and II-V) “the development of self-confidence as an educator”.

Table 6. Types of positive critical learning incidents (PCLI Type II- ) of nurse student teachers during the second teaching practicum

<table>
<thead>
<tr>
<th>FINNISH STUDENTS</th>
<th>BRITISH STUDENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>I) Team teaching with peers.</td>
<td>I) Team teaching with peers.</td>
</tr>
<tr>
<td>II) Importance of peer assessment.</td>
<td>II) Careful preparation before a teaching session.</td>
</tr>
<tr>
<td>IV) Significance of the mentor and tutor’s support.</td>
<td>IV) Collegial support creates a feeling of being a team member.</td>
</tr>
</tbody>
</table>

Types of positive critical learning incidents (PCLI Type II-) of Finnish nurse student teachers

PCLI TYPE II-I: TEAM-TEACHING WITH PEERS

Team teaching with peers fosters the student teacher’s self-confidence as a prospective teacher. The requirements for team teaching are that the student teachers trust each other and the process of a common goal and view on future team teaching. During this process the student teacher learns to listen to the peer’s views and argue personal views, which develops collaborative skills. Team teaching includes cooperative planning, implementation and assessment phases. Peer support is crucial in the implementation phase, especially in those situations that the student teacher has difficulty to manage. In the assessment phase sharing
and analysing the teaching experiences with others who have been responsible for the same situation is significant for the student teacher.

**PCLI TYPE II-II: IMPORTANCE OF PEER ASSESSMENT**
The student teacher’s didactic thinking develops while she observes the peer student’s teaching and gives peer assessment. Positive and detailed peer assessment is very significant, especially if the mentor’s assessment is either very general in nature or emphasises too much on only some very specific developmental needs and includes no assessment of the whole teaching situation.

**PCLI TYPE II-III: THE JOY OF LEARNING TOWARDS TEACHERHOOD**
Development of the student teacher’s didactic thinking and practical skills according to the learning goals she has set earlier enhance the sense of studies. The student teacher’s didactic thinking develops by observing and analysing learning situations, in which a new content or teaching and learning method is used. The opportunity to practice new and challenging teaching and learning methods as well as to utilize the student teacher’s clinical experience make learning a joy.

**PCLI TYPE II-IV: SIGNIFICANCE OF THE MENTOR’S AND TUTOR’S SUPPORT**
The support of the mentor/tutor is significant and encourages the student teacher to set her own learning goals, which differ from those of peers. Student teacher’s and the mentor’s/tutor’s flexible collaboration enables the student teacher to present different views and reflection on them. The mentor/tutor helps the student teacher at a practical level to get appropriate learning opportunities.

**PCLI TYPE II-V: LEARNING TO MANAGE WITH SERIOUS PRE-TEACHING STRESS**
Carefully preparing the lesson content helps the student teacher to manage with and even relieve serious stress resembling stage fright, which causes strong psychological and physical symptoms prior to a teaching situation.
Types of positive critical learning incidents (PCLI Type II- ) of British nurse student teachers

**PCLI TYPE II-I: TEAM TEACHING WITH PEERS**
The collaborative team teaching with peers promotes the student teacher to think creatively about the subject of the session and improves critical discussion and the quality of the teaching. Team teaching makes it possible to assess the progress of the session while the peer is teaching and acting as a teacher.

**PCLI TYPE II-II: CAREFUL PREPARATION BEFORE A TEACHING SESSION**
Lack of confidence in one’s own teaching skills, while being an expert on the subject, causes a very careful preparation of the lesson content of the teaching session and leads to a successful implementation of teaching and learning.

**PCLI TYPE II-III: CONTINUITY AS A FACILITATOR TO THE DEVELOPMENT OF STUDENT NURSE - STUDENT TEACHER RELATIONSHIP**
The possibility for continuing and progressing relationships with same students helps developing a rapport with the students and develops the student teacher’s self-assessment skills. The assessment feedback the nurse student teacher receives on positive progress in the teaching sessions develops personal self-confidence as an educator.

**PCLI TYPE II-IV: COLLEGIAL SUPPORT CREATES THE FEELING OF BEING A TEAM MEMBER**
The collegial support from mentors and peers increases the student teacher’s development in a stressful situation and creates feelings of being a team member.

**PCLI TYPE II-V: THE DEVELOPMENT OF SELF-CONFIDENCE AS AN EDUCATOR**
Independent and flexible change in teaching methods in the original lesson plan, based on the process assessment of the students’ progress, increases student teacher’s self-confidence as an educator.
5.1.4 Types of negative critical learning incidents of nurse student teachers during the second teaching practicum (NCLI Type II-)

The Types that were found from the student teachers’ experiences during the second teaching practicum are as follows (Table 7) for Finnish students II-I) frustration because of superficiality in reflection seminars, II-II) difficulties in peer assessment, II-III) differences in goals cause problems in peer collaboration, II-IV) problems between tutor and mentor and II-V) vagueness in organizing studies. Concerning British students: II-I) problems in relationship with nursing students, II-II) problems in managing the progress of the teaching sessions, II-III) fear and discrepancy of views on the assessment of the teaching session and II-IV) problems to arrange an assessor for the teaching session were found.

Table 7. Types of negative critical learning incidents (NCLI Type II-) of nurse student teachers during the second teaching practicum

<table>
<thead>
<tr>
<th>FINNISH STUDENTS</th>
<th>BRITISH STUDENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>I) Frustration because of superficiality in reflection seminars.</td>
<td>I) Problems in relationship with nursing students.</td>
</tr>
<tr>
<td>II) Difficulties in peer assessment.</td>
<td>II) Problems in managing the progress of the teaching sessions.</td>
</tr>
<tr>
<td>III) Differences in goals cause problems in peer collaboration.</td>
<td>III) Fear and discrepancy of views on the assessment of the teaching session.</td>
</tr>
<tr>
<td>IV) Problems between tutor and mentor.</td>
<td>IV) Problems to arrange an assessor for teaching session.</td>
</tr>
<tr>
<td>V) Vagueness in organizing studies.</td>
<td></td>
</tr>
</tbody>
</table>
Types of negative critical learning incidents (NCLI Type II-1) of the Finnish nurse student teachers

NCLI TYPE II-I: Frustration because of superficiality in reflection seminars
The student teacher feels frustration in reflection seminars because of the superficial level of discussion related to the development as a teacher, whereas the topic would be more suitable to reflect on collaboratively in a small group. However, in the reflection seminars it would be necessary to reflect on experiences that have emerged during the teaching practicum with students other than the ones in the small collaborative group. The student teacher feels unsatisfied because of not learning any new issues and feels the inability to give honest feedback to educators.

NCLI TYPE II-II: Difficulties in peer assessment
Difficulties in peer assessment exist because the student teacher’s aim is to give feedback in a kind manner and which is at a level so general that the feedback recipient does not understand the meaning of the feedback though it includes the student teacher’s developmental needs. Moreover, some students are not willing to receive feedback from peers due to unwillingness to participate in an uncomfortable situation. Difficulties may exist because of the mentor and peer’s differing views on student teacher assessment.

NCLI TYPE II-III: Differences in goals causes problems in peer collaboration
Peers who are very goal-orientated and acting according to their goals cause problems in the group and make for a poor group atmosphere. Therefore, some of the student teacher peers’ learning goals are not processed enough in the collaborative group between peers. Conflicts between peers occasionally diminish peer collaboration. However, an open discussion and solutions to the conflicts improves the learning atmosphere.

NCLI TYPE II-IV: Problems between tutor and mentor
Problems concerning collaboration between student teacher, tutor and mentor emerge when the student teacher does not receive sufficient support from the tutor/mentor when planning and accepting learning goals. Also when the tutor or mentor is replaced several times during
the teaching practicum. Moreover, the student teacher is concerned by the tutor’s/mentor’s limited didactic views of tutoring, which is not in line with modern theoretical views on tutoring.

**NCLI TYPE II-V: VAGUENESS IN ORGANIZING STUDIES DURING THE TEACHING PRACTICUM**

Vagueness and insufficient information in organizing the teaching practicum and difficulties in obtaining tutors creates additional stress to the student teacher.

**Types of negative critical learning incidents of British nurse student teachers**

**NCLI TYPE II-I: PROBLEMS IN THE RELATIONSHIP WITH NURSING STUDENTS**

Difficulties to make contact with the nursing students because they are so concentrated on discussing with one another, are unmotivated to study or disturb the advancement of the lesson plan by arriving late makes the student teacher feel unsuccessful in the relationship with the students.

**NCLI TYPE II-II: PROBLEMS IN MANAGING THE PROGRESS OF THE TEACHING SESSION**

Difficulties to master the use of student centred teaching and learning methods or not being an expert on the teaching contents makes the student teacher feel uncertain during the session. The feeling has a negative effect on the progress of the session, especially in the relationship with students.

**NCLI TYPE II-III: FEAR AND DISCREPANCY OF VIEWS IN ASSESSMENT OF THE TEACHING SESSION**

The assessment of the teaching session makes the student teacher feel fear and other critical feelings due to the discrepancy between personal self-assessment and the mentor’s assessment. However, the mentor’s assessment is more encouraging than the student teacher’s self-assessment.
NCLI TYPE II-IV: PROBLEMS TO ARRANGE AN ASSESSOR FOR THE TEACHING SESSION

Difficulties in arranging for an assessor for the teaching practicum because the mentor feels too familiar with the student teacher, cancelling the agreement of being the assessor, or lack of time to be an assessor makes the student teacher feel very stressed.

5.2 Types related to reflection of the critical learning incidents (R) of nurse student teachers

At the end of their first and second teaching practicum both Finnish and British nurse student teachers reflected on their critical learning incidents in seminars. Table 8 shows the Types that were found based on the student teachers’ experiences of the reflection seminars. The Finnish nurse student teacher R Types contain meanings that describe how learning had advanced as well as counter meanings. Briefly described the Finnish sessions were demanding, unpleasant and therefore not fostering learning. The Finnish student R Types were nominated as follows concerning the first teaching practicum I-I) fostering learning while the anonymity of critical learning incidents causes unexpected stress, I-II) fostering learning although concentration decreases as too much time reserved for reflection and I-III) wearing out resources and not fostering learning.
Table 8. Types related to reflection seminars of Finnish and British nurse student teachers

<table>
<thead>
<tr>
<th>FINNISH STUDENTS</th>
<th>BRITISH STUDENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>First teaching practicum</strong></td>
<td></td>
</tr>
<tr>
<td>I) Fostering learning while the anonymity of critical learning incidents causes unexpected stress.</td>
<td>I) Becoming aware of emotions and real opinions.</td>
</tr>
<tr>
<td>II) Fostering learning although concentration decreases as too much time reserved for reflection.</td>
<td>II) The development of teacher’s professional knowledge.</td>
</tr>
<tr>
<td>III) Wearing out resources and not fostering learning.</td>
<td></td>
</tr>
<tr>
<td><strong>Second teaching practicum</strong></td>
<td></td>
</tr>
<tr>
<td>II) Disappointment related to the perception of the absence of own critical incident in the public analysis.</td>
<td>II) Usefulness of group reflection.</td>
</tr>
<tr>
<td>III) Problems in collaborative learning.</td>
<td>III) Stress before group reflection.</td>
</tr>
</tbody>
</table>

The British student R Types were I-I) *becoming aware of emotions and real opinions*, I-II) *the development of teacher’s professional knowledge*. In the second teaching practicum Finnish nurse student teachers’ R Types were II-I *the public analysis of one’s own critical learning incident causes stress*, II-II) *disappointment related to the perception of the absence of own critical incident in the public analysis*, II-III) *problems in collaborative learning* and British nurse student teachers’ R Types were II-I *awareness of the significance of teamwork*, II-II) *usefulness of group reflection* and II-III) *stress before group reflection*.

**Types of Reflection: Finnish nurse student teachers first teaching practicum**

**R TYPE I-I: FOSTERING LEARNING WHILE THE ANONYMITY OF THE CRITICAL LEARNING INCIDENTS CAUSES UNEXPECTED STRESS**
The analysis of a critical learning incident fosters learning for the analysis is based on the students' experiences. The analytic process is demanding. The anonymous analysis of one's own critical learning incident causes unexpected stress that the student teacher is not prepared for when she gives the informant consent to use the critical learning incident in the reflection seminar.

The analysis of peers does not correspond to the analysis of the student teacher. The student teacher assumes this is due to the peers not having enough concrete information of the critical learning incident that the student teacher has described and because the peers are not very skilful in analysis. The student teacher regards it important that the tutor models the analysis of critical learning incident and guides students to analyse the assumptions of a particular critical learning incident in a goal-oriented way.

The reflection with tutor and peers is plausible and raises different views. Describing by writing both negative and positive critical learning incidents is a significant and creative way of learning, which fosters awareness and describing one's own experiences. The description of negative experiences liberates emotional resources. However the written description of a negative critical learning incident can prove stressful because the tutor reads the description. The nurse student teacher will continue using the critical learning incident method in future work as a teacher.

**R TYPE I-II: FOSTERING LEARNING ALTHOUGH CONCENTRATION DECREASES AS TOO MUCH TIME RESERVED FOR REFLECTION**

The use of critical learning incidents fosters learning because the joint analysis of incidents enables the student to recognize differences and similarities that belong to different people's experiences. The analysis among peers is motivated and deeply focused especially at the beginning of the analysis. However, attentiveness decreases because of the plentiful amount of time reserved for carrying out the analysis. The tutor's guidance is significant at the beginning of analysis and in making the connection between experiential and theoretical knowledge. Sharing a negative critical learning incident with peers and getting feedback from them assists in examining personal experience more objectively. That several peers have rather negative experiences of teaching practicum is unexpected and may be a cause for unrealistic goals that are impossible to achieve. The critical learning incident method will be used when the student teacher works as a teacher in the future.
R TYPE I-III: WEARING OUT RESOURCES AND NOT FOSTERING LEARNING
Group discussion of critical learning incident analysis wears out resources and does not foster learning, because the atmosphere in the learning environment does not support open analysis and discussion assesses the critical learning incident in a negative way. This is the usual way to communicate also in other learning situations implicating the lack of collaborative skills like communication and argument skills. The lack of more detailed information related to the content of the critical learning incident forces one to reflect based upon images and interpretations and may be one reason for experiencing the situation as not being a learning-fostering one.

It is difficult to describe the critical learning incident in a written form and unwillingness to do that relates to the fear of peers’ judgements. The beforehand information of peers whom the analysis will be done with is necessary in order to evaluate whether the future critical learning incident analyses with peers will be confidential.

Types of Reflection: British nurse student teachers first teaching practicum

R TYPE I-I: BECOMING AWARE OF EMOTIONS AND REAL OPINIONS
The reflection on critical learning incidents brings about the awareness of emotions and real opinions that relate to the learning experience. The opportunity to share experiences with peers in a safe learning environment deepens and expands the student teacher’s views and reveals the assumptions on which the student teacher’s thinking is based upon without truthful evidence. The regular use of the critical learning incident method during the teaching practicum is appropriate and significant from the point of learning and should be applied with students who have good discussion skills.

R TYPE I-II: THE DEVELOPMENT OF TEACHERS’ PROFESSIONAL KNOWLEDGE
Reflection on critical learning incidents fosters the development of the teachers’ professional knowledge base by integrating academic and clinical knowledge. Group reflection with peers in a safe learning environment fosters learning by noticing the similarities and differences in learning experiences. By imagining oneself in a similar situation where the peer has been and reflecting on strategies of action in the situation, there is a further chance to learn of peers’ experiences.
Types of Reflection: Finnish nurse student teachers second teaching practicum

**R TYPE II-I: THE PUBLIC ANALYSIS OF ONE’S OWN CRITICAL LEARNING INCIDENT CAUSES STRESS**

The individually written description of critical learning incidents and reflection on it is meaningful preparation for joint analysis. In a collaborative group noticing that one of the critical learning incidents meant for joint public analysis is one’s own causes stress and possibly withdrawal from discussion in order to keep revealed that the critical learning incident under closer scrutiny is one’s own. The anonymous analysis of critical learning incidents in collaborative analysis is not meaningful.

In collaborative analysis noticing the similar experiences of peers fosters learning, as does the analysis of the negative critical learning incident. The analysis of critical learning incidents is disturbed by simultaneous problems in collaborative learning. However, the critical learning incident method is seen by the student teacher as useful in health care education and teaching of nursing students.

**R TYPE II-II: DISAPPOINTMENT RELATED TO THE PERCEPTION THAT OWN CRITICAL LEARNING INCIDENT IS NOT IN THE PUBLIC ANALYSIS**

Describing critical learning incidents in a written form individually and reflecting on them is motivating and structures thoughts, because it allows examining the diversity of the experiences from different perspectives. The possibility to describe the experiences with everyday language is meaningful, but all details included in the original experience are not provided so that those peers who have been in the real situation could not identify the critical learning incident. The joint analysis causes stress that the nurse student could not have been prepared for when giving the promise for analysing the critical learning incident together with peers. Therefore, anonymous analysis is not meaningful.

The collaborative analysis creates disappointment if one’s own critical learning incident is not in public analysis and therefore it is not possible to get feedback from peers and tutors. Overall, the joint reflection upon critical learning incidents with peers fosters learning, although the discussion may not be deep enough, and therefore not in line with the learning goals of teacher development. The conflicts concerning collaborative learning hinder attentiveness to the analysis of critical learning incidents.
R TYPE II-III: PROBLEMS IN COLLABORATIVE LEARNING
The written description of critical learning incidents before joint analysis is meaningful because they can be described concretely compared to ad hoc descriptions. The anonymous analysis of critical learning incidents is appropriate because it fosters the detailed descriptions of original experiences.

The simultaneous conflicts in collaborative learning hinder open and deep joint discussions with peers. Own views are defended and dialogue does not emerge between the peers. The willingness to protect oneself and unwillingness to deepen the conflicts hinder saying one’s views explicitly. Listening to the peers’ different views enlarges views, but does not deepen the learning of the content. It requires more time to provide and examine research knowledge and compare it to the original experience in the analysis. Instead of that the joint analysis fosters team working and the analysis of feelings as a part of learning. The critical learning incident method will be used in future work as a teacher.

Types of Reflection: British nurse student teachers second teaching practicum

R TYPE II-I: AWARENESS OF THE SIGNIFICANCE OF TEAMWORK
The analysis of critical learning incidents teaches the importance of teamwork and the importance of the support of the team especially to novice teachers. Sharing the negative experiences with peers and getting feedback from them fosters realizing a specific situation in a larger context by becoming aware of similar experiences of peers.

R TYPE II-II: USEFULNESS OF GROUP REFLECTION
Sharing experiences by reflecting on them with peers promotes finding out new views to examine. Reflecting with peers is a significant and effective strategy to learn and it teaches one to consider alternative ways to act in a similar situation in the future.

R TYPE II-III: STRESS BEFORE GROUP REFLECTION
The assumption that people in general are unwilling to share inner feelings with each other causes stress before a group reflection. Sharing experiences with peers and getting feedback from them shows similarities in the critical learning incidents and that supports the student
teacher's learning. Learning through the critical learning incident analysis develops teamwork skills, which a teacher needs.

5.3 Comparison of Finnish and British nurse student teacher Types

In this section, the comparison between the Types of Finnish and British nurse student teachers is presented for the purpose of examining similarities and differences in the meanings included in (a) the critical learning incidents and (b) the use of critical incident method in the collaborative reflection seminars.

**During the first teaching practicum** the first commonality identified in the positive critical learning incidents was mentor's collegial attitude to organize learning opportunities strengthening student teacher's teacher identity and motivation to self-development. This was a common type for Finnish PCLI Type I-I and British PCLI Type I-I nurse student teachers. PCLI Type I-I contained meaning of mentor as a supporter of student teacher's goal-oriented learning and development of student teacher's self-confidence as an educator. Another common Type common to both Finnish and British nurse student teachers shared was PCLI I-II *mentor as a positive role model*. However, the meanings related to the role modelling were different between the Finnish and the British students. The Finnish nurse student teachers described mentor as a positive role model in managing the complex work life of a nurse teacher, whereas the British students experienced the mentor as a role model for a successful nurse teacher - nurse student relationship.

During the first teaching practicum, one of the differences between the Finnish and British nurse student teachers was *collaboration as a safe model to solve conflicts* that could be found in Finnish nurse student teacher PCLI Type I-III. The Finnish students experienced collaborative learning with peers as an opportunity to practise solving conflict situations. This kind of meaning related to collaborative studies was not in the British nurse student teacher types. The second difference which emerged between the Finnish and British students was British PCLI Type I-III *formulating a personal theory of teaching and learning*. This Type described some of the changes in the British nurse student teachers' educational thinking, moving from idealistic views of teaching and learning towards educational thinking that includes views of real situations in the learning environment. The third difference that
was found between Finnish and British nurse student teachers was the British PCLI Type I-IV: understanding teacher’s need to continuously develop oneself. In that Type, what the British student teachers thought of as a nurse teacher changed from the complete teacher to teacher as a lifelong learner. Important to the change of nurse student teachers’ thinking was observing a nurse teachers’ meeting where teachers discussed their learning needs openly.

A comparison of the similarities and differences between the Finnish and British nurse student teachers’ Types concerning negative critical learning incidents shows that no similarities were found. Finnish nurse student teachers NCLI Types were related to the mentor (NCLI Types I-I, I-II, I-III, I-IV, I-VI), problems with peers (NCLI Type I-V) and problems in organizing studies (NCLI Type I-VII). British nurse student teachers NCLI Types describe inapplicable teaching and learning methods related to nurse students’ learning needs (NCLI Types I-I, I-I IV), problems between mentors (NCLI Type I-II), problems in nurse student teacher’s educational skills (NCLI Types I-III, I-V), organization culture (NCLI Type I-VI) and problems in the physical learning environment (NCLI Type I-VII).

Comparison between the Types of positive critical incidents that Finnish and British nurse student teachers described during the second teaching practicum shows that one common Type emerges. PCLI Type II-I describes team-teaching as a positive learning opportunity in which important are the joint critical discussions with peers and the feeling of shared responsibility of the progress of the teaching session. Finnish PCLI Type II-II described the significance of positive and detailed peer assessment in nurse student teacher’s development. Finnish PCLI Type II-IV described the significance of supervising teachers’ support conducting to the setting individual goals for learning. Learning to manage with serious stress before a teaching session, Finnish PCLI Type II-V, described the stress the nurse student teacher felt prior to a teaching session. The stress caused psychophysical symptoms, however as the teaching practicum progressed and the student teacher acquired successful teaching experiences stress-management was learned. One strategy to manage the stress was the careful preparation of the teaching session. Careful preparation of the teaching session was found in one British PCLI Type II-II but in that Type stress did not emerge as a factor as it did in Finnish PCLI Type II-V. However, British PCLI Type II-IV described the collegial support the nurse teacher student received from peers and mentor in a stressfull situation. British PCLI Type II-III the continuity with the same nurse students was meaningful to learn
how to develop a teacher–student rapport. This kind of meaning did not emerge in the Finnish Types. Finnish PCLI Type II-III described the feeling of joy felt when noticing one’s own development of educational thinking and skills. The same kind of meaning emerged in British PCLI Type II-IV that described nurse student teacher’s development of self-confidence as an educator, while being capable to assess the process of students’ learning during the teaching session and flexibly changing the pre-session made plans to meet the students’ needs.

The negative critical learning incident Types during the second teaching practicum show that difficulties in the assessment of teaching session is a meaning that is included both in the Finnish (NCLI Types II-II, II-IV) and British (NCLI Types II-II, II-III, II-IV) nurse student teacher Types. The Finnish NCLI Type II-II described assessment that was pleasant in nature but did not handle peer’s developmental needs at a concrete level. Whereas British NCLI Type II-III described the fear the nurse student teacher felt before the assessment of the teaching session and an inability to receive positive feedback from the mentor. British NCLI Type II-IV expressed stress of the nurse student teacher related to the difficulties of arranging an assessor for the teaching session. Similarly, Finnish NCLI Type II-V described difficulties in arranging studies because of a lack of general information about nurse teachers’ studies.

Three Finnish nurse student Types described difficulties to achieve learning goals and this difficulty was related to the inadequate learning goals in the reflection seminars (NCLI Type II-I), different learning goals with peers (NCLI Type II-III) and not receiving enough support from tutor or mentor toanalyse nurse student teachers’ learning goals carefully (NCLI Type II-IV). Two British nurse student teachers’ Types included the meaning of problems with nurse students: NCLI Type II-I in regard that the nurse students were not motivated to follow nurse student teacher’s teaching, and NCLI Type II-II described that the nurse student teacher did not feel comfortable with using student-centred teaching and learning methods.

A comparison between Finnish and British nurse student teachers’ meanings concerning the use of critical learning incidents during reflection seminars reveals interesting differences. In general it seems that the Finnish nurse student teachers felt the reflection seminars more problematic than the British students. Three Finnish Types (first teaching practicum: R Types I-I, I-II, second teaching practicum: R Type II-I) felt that the use of analysis of critical learning incidents fostered learning towards a nurse teacher and therefore
is an appropriate learning method and will be used in the future when they begin their work as a nurse teachers. The analysis of critical learning incidents is meaningful because by using it learning is based on the reality the nurse student teachers have been involved in and they can collaboratively share experiences through comparing differences and similarities with their peers. Therefore, the anonymous processing of critical learning incidents in reflection seminars causes problems, because it is not possible to give many details about the incident. Preparing the critical learning incidents in a written form is important and helps nurse student teachers to become aware of their personal experiences. The Finnish R Types I-I, I-II, first teaching practicum, placed emphasis on the significance of the tutor to supervise and model the analysis of critical learning incidents. All Finnish nurse student teachers participating in this study considered the analysis of critical learning incidents as not a useful learning method, R Type I-III first teaching practicum, as it was felt demanding and did not foster learning. This was because of problems in collaborative working and learning. Some of the Finnish nurse student teachers wanted to protect themselves and in order to avoid conflicts with peers were not willing to discuss openly in the reflection seminar. That is why the content of the subject matter did not deepen. Despite this, their teamwork skills did develop (R Type II-III second teaching practicum).

One Finnish R Type II-II second teaching practicum described the usefulness of the analysis of critical learning incidents but at the same time told of dissatisfaction for not having the chance to analyse one’s own critical learning incident with peers, because tutors had selected only some critical learning incidents for collaborative analysis.

Like the Finnish nurse student teachers, the British students felt that collaborative analysis of critical learning incidents useful because it gave them an opportunity to (a) share experiences in a safe learning environment and (b) see them more objectively (first teaching practicum: R Types I-I, I-II, second teaching practicum: R Types II-I, II-II, II-III). As a result of learning when analysing critical learning incidents in the seminars British Types described (a) becoming aware of the assumptions behind their learning (first teaching practicum: R Type I-I), (b) developing the professional knowledge of a nurse teacher (first teaching practicum: R Types I-II) and (c) teamwork skills (second teaching practicum: R Types II-I, II-III). All these meanings describe reflectivity that has occurred during the analysis seminars. British R Type II-II second teaching practicum felt that reflection with peers was a significant and effective strategy to learn and expand one’s thinking.
Only one British R Type II-III second teaching practicum had had negative feelings. That Type described stress and unwillingness to share experiences within the collaborative seminars. However, this experience turned into a positive one through the collaborative analysis with peers.
6 DISCUSSION

6.1 Credibility of the study

This study belongs to the “The Evaluation and Development of Contents and Teaching and Learning Methods” project in which the overall purpose concerning critical learning incidents is to develop the quality of nursing education by developing teaching and learning environments whereby nurse student teachers have the opportunity to learn both theoretically and in practice the use of critical learning incidents. The aim is for nurse student teachers to achieve teacher’s educational skills that they will use in their future profession as a nurse teacher. The purpose of this study was to investigate Finnish and British nurse student teachers’ experiences of becoming a reflective nurse teacher during the process of teaching practicum by describing nurse student teachers’ critical learning incidents and experiences of analysing the critical learning incidents as a teaching and learning method in reflection seminars and by comparing similarities and differences between Finnish and British nurse student teachers. In addition, the purpose was to evaluate on the basis of the results of the study, the appropriateness of the use of critical learning incidents as a teaching and learning method in the nurse teacher education.

Many authors point out that there are no generally accepted criteria to evaluate the credibility of qualitative study (e.g. Giorgi 1988, Patton 1990, Nieminen 1997, Cutcliffe & McKenna 1999) including phenomenological research. However, Nieminen (1997) presents three central issues that should be examined in order to evaluate and indicate the credibility of a qualitative study. These three central issues are (a) the quality of the data of study, (b) analysis of the data and (c) reporting of the study.

The quality of the data of this study

The data of this study consist of written critical learning incidents and theme interviews, which were conducted by two researchers, one in Finland and the other in the United Kingdom. The data were collected from nurse student teachers that had experiences related to the research interest of this study and were willing to participate in this study. The nurse
student teachers were capable of expressing their experiences both in a written form (written critical learning incidents) and orally in interviews. The quality of both the written and interview data was mainly concrete, detailed and descriptive. Therefore the written and oral descriptions the nurse student teachers provided of their experiences were suitable for phenomenological research. The descriptiveness of the data is one of the basic demands for phenomenological research and this requirement was fulfilled in this study. (Giorgi 1985b, 2000a, see also Morse 1999a) However, some of the descriptions of the critical incidents were quite short and for that reason it was important to have sufficiently incidents as was the case in this study.

Analysis of the data

The descriptive phenomenological method developed by Giorgi (1985ab) was used in this study for conducting the data analyses. The original method described by Giorgi (1985a) was applied in the sense that the specific description of situated structure of a single participant of the study (phase four) was in this study presented as a meaning net instead of expressing the specific description of situated structure as sentences. This was done to focus on the meanings that could be found from each participant's experiences and to clearly locate and formulate the types based on participants' meanings.

The use of two researchers in the data collection and especially the fact that the data were analysed by a researcher to whom English is not a native language can be seen as a limitation of the study and might cause some problems, such as how to identify the meanings in British nurse student teachers' experiences. An attempt to minimize this problem was made as follows: common principles of data collection were formulated prior to data collection and they were followed in both countries. In addition, during the data analysis the two researchers discussed several times the quality of data and the advancement of the analysis in order to assure its reliable progress. The progress of the study and the descriptive phenomenological method used in this study (Tossavainen 1996) has been discussed several times in the research group whose leader is familiar with the nurse teacher education in Finland and England. The discussions were also a method to become aware of the researcher's natural attitude toward the phenomenon under study, bracket it and focus on analysing the data from the experiences of the participants. However, ethnography might be one alternative methodological approach
to conduct educational research in which data is collected from various cultures. Then cultural viewpoints could be taken account more accurately that they were taken in this study for instance more cultural specific conclusions could be made on the base of the results. (See Crotty 1996)

In phenomenological study bracketing is an important issue as well as the systematic use of an analyse method (Giorgi 1985a, see also Morse 1999b). Descriptiveness is an important principle not only for the quality of data but also for the goal of the analysing process. In this study the aim was to describe the results based on the meanings located in the participants' experiences. For this reason the researcher was continuously aware to not interpret the data. This is another criterion for evaluating the credibility of a descriptive phenomenological study. Closely related to the two criteria (descriptiveness of data and analysis) mentioned above is the success in searching for essences through imaginative variation, which was done in this study by systematically reflecting on the different possibilities to describe the most invariant meaning of an experience. That meant description at typical level rather than particular or universal level. (Giorgi 1985b)

One criterion regarding the credibility of the researcher means according to Patton (1990) what the researcher brings to the study in terms of qualification, experience and perspective. During 1995-1997 the researcher participated in three methodological courses concerning descriptive phenomenological research. Professor Amedeo Giorgi, the developer of the method used in this study, conducted these courses. In addition the researcher of this study has used the descriptive phenomenological method in former investigations (Turunen 1998). The researcher has been honest in collection and analyses of the data and in reporting the results of this study.

Another criteria for the credibility of qualitative research is do the results of the study describe new views of the phenomenon under study and how are the results relevant in practice e.g. in developing nursing practicum or education (Nieminen 1997). Teacher education has been the research topic in many earlier studies, but globally nurse teacher education and the use of critical learning incidents is a little researched area. Based on this, the research of this study is relevant. The results of this study describe the experience of becoming a reflective nurse teacher during the process of teaching practicum by describing nurse student teachers' critical learning incidents and experiences of analysing the critical
learning incidents as a teaching and learning method in reflection seminars and by comparing similarities and differences between Finnish and British nurse student teachers. In addition, the purpose was to evaluate on the basis of the results of the study, the appropriateness of the use of critical learning incidents as a teaching and learning method in nurse teacher education. The descriptive level of knowledge development may be seen also as a limitation of educational study. Allen et al (1986, 36) for instance present that “from the point of view of research in nursing education, critical theory reframes the dilemma concerning the value-laden nature of education. Interpretation and values are inseparable, including the interpretations of what it means to be scientific as well as what it means to be a nurse”. In addition, Porter (1995) points out that communicative action is predicated upon reflexive knowledge and therefore this kind of knowledge is needed in nursing. However, diverse methodological approaches are needed in developing scientific knowledge in nursing (Porter 1995).

Reporting of the study

Credibility of reporting the study means the researcher has succeeded to report the research so that readers can understand the researcher’s progress and decisions. The successfullness in labelling and nominating the meanings is one critical point in evaluating the quality of qualitative research (Nieminen 1997). In this study the researcher has followed the guidelines of descriptive phenomenological method developed by Giorgi (1985ab) and stated the results in the form of descriptive sentences instead of expressing the results, for instance in figures which is commonplace in qualitative nursing research. In finding the appropriate level of description, the researcher found it challenging in some cases and one may notice it when evaluating the results.

6.2 Ethical issues

This study is a part of “The Evaluation and Development of Contents and Teaching and Learning Methods”, which is a joint research project of the Universities of Kuopio in Finland (Department of Nursing Science) and Northumbria at Newcastle in the United Kingdom (the Faculty of Health, Social Work and Education). Both institutes gave their permission for this
particular study. Participants were informed both orally and in written form the purpose of the study. The nurse student teachers participated in this study voluntarily and had the right to withdraw at any stage of the study. In addition, parts of the data (written critical learning incidents) were originally learning tasks for participating nurse student teachers and a compulsory part of their studies. Students were informed about their right to refuse the use of their written critical learning incidents for research purposes and that it would not harm their studies if they decided not to participate (Appendix 3). They were also informed that it would not harm them if they brought up critical issues concerning their teaching practice when describing negative critical learning incidents. Anonymity and confidentiality were guaranteed during each of the study’s phases. Therefore, detailed information of the participants of this study is not given, because the study group is small in both countries and could be easily recognized. Special attention was paid to the collaborative work between the two researchers who collected the data. The ethical principles were carefully discussed before data collection and followed strictly in both countries (See also Yhdistetty säännöstö: Ihmisten käyttö tutkimuskohteina (ns. Reynolds säännöstö) 1979, Lima Declaration 1988, Vehviläinen-Julkunen 1993, Holloway & Wheeler 1995).

6.3 Considerations of main results

6.3.1 Types of nurse student teachers critical learning incidents

The results of this study show that several different types based on the meanings of Finnish and British nurse student teachers' positive and negative learning experiences of their teaching practicum were found.

6.3.1.1 Importance of the mentor

The significance of a mentor was evident both in the types of the Finnish and British nurse student teachers and as a facilitator but also as a person who made the learning environment unsupportive. One common type “the mentor’s collegial attitude towards organizing learning opportunities strengthening the student teacher’s teacher identity and motivation to self-development” emerged. In that type, the mentor concentrated to analyse with the student
teacher the particular student teacher’s learning needs, goals, and opportunities to achieve the goals. The mentor’s collegial attitude increased the student teacher’s self-confidence as a prospective teacher. In addition, mentor’s collegial attitude towards the student teacher made her feel herself a member of a teacher team. Same kind of results have been found in earlier studies in teacher education in which the crucial role of the mentor has been emphasised for the student’s success in the practicum considering the importance of the student teachers’ place on their teaching practicum and the fact how overwhelmed student teachers may be during the beginning of teaching experiences. (Fairbanks et al 2000, Murray-Harvey et al 2000)

Many researchers have reported how mentors help student teachers to make the transition into professional life by introducing them to the school environment, providing detailed instructions and assisting the student teachers to discuss their professional roles and relationships. The development of a collaborative relationship between the mentor and the student teacher seems to mean an exchange of ideas through modelling, dialogue and experience fostering the student teacher’s and the mentor’s professional growth. The development of the relationships with faculty and staff seems to be perceived as an important step for student teachers because it encourages the student teachers to see themselves as a part of the faculty. (Watson 1995, Scanlan & Chernomas 1997, Fairbanks et al 2000, Murray-Harvey et al 2000, see also Campbell & Campbell 2000, Cope et al 2000, Kochan & Trimble 2000)

The results of this study show that the mentor’s uncollegiality and problems in the mentor – student teacher relationship caused uncertainty and decreased the student teacher’s self-esteem. This could be observed when the mentor belittled the student teacher’s small amount of experience as a nurse and was not prepared to meet the student teacher despite earlier agreements. Problems between mentors caused by the inability to receive feedback from other mentors as well as the mentor’s uncollegial attitude towards the student teacher resulted in the student teacher thinking about the purpose of behaving and debating professionally. The results agree with the former studies, which show that developing a collaborative relationship between the mentor and the student teacher may include also tentativeness because of problems with time, scheduling meetings, interpersonal difficulties and also a lack of commitment from students. (Fairbanks et al 2000, Murray-Harvey et al 2000, see also Campbell & Campbell 2000, Cope et al 2000) Additionally, the social learning environment
where the teaching practicum takes place is extremely important and may not always be at the desired level. Mäkkisalo (1998) found that the study of organizational culture in seven Finnish health care educational institutes that nursing students' views on nurse teachers' attitudes towards students described some teachers' indifference, even unethical attitude. This presented itself in the nurse teacher's unequal attitude between students and by belittling and embarrassing students.

Cope et al (2000) found that most mentors were likely to be performing the support role of students in an implicit fashion and did not have explicit strategy for supporting students. Mullen (2000) stresses collaborative mentoring (school – university) as a powerful force for professional development and change in institutional settings. Collaborative mentoring promotes the development of new synergistic relationships and organizational structures. Collaborative mentoring promotes a kind of counter-culture that is opposed to prevailing institutional practices of separation and exploitation. When practiced effectively, collaborative mentoring becomes a new form of participatory action research rooted in social equality. Collaborative mentoring is not a proactive force among individuals; it is also a catalyst for changing traditional practices, hierarchical systems, and homogeneous cultures that result in stagnation. Collaborative mentoring has the potential to infiltrate and reshape the socialization process in teacher development.

One type based on the British student teachers' meaning described the significance of the mentor as a positive role model for the relationship of the teacher and students. The teacher discussed openly the ground rules of behaving in the learning environment and used student centred and reflective teaching and learning methods. Whereas mentor's inability to manage with disturbance caused by nursing students as well as the use of inappropriate teaching and learning methods related to the needs and skills of nurse students were described as negative meanings. The results are consistent with results of Fairbanks et al (2000), who found that mentors provided models of interpersonal interactions for the student teachers concerning students and other professionals. The student teachers learned about the complexity of the teacher's interaction with students by observing the mentors who provided models of student - teacher relations. The mentors helped the student teachers negotiate a professional relationship. (See also Wodlinger 1990)
From the Finnish nurse student teachers’ meanings a type was formulated that described the *mentor’s realistic description of the nurse teacher’s working life* and strategies how to manage the teacher’s work. However, the nurse teacher’s negative description of personal work and suspicion of the student teacher’s ability to observe the work of a nurse teacher realistically placed the student teacher to think about the sense of educational studies, but also strategies to manage the teacher’s work. Harri (1997) found that the Finnish nurse educators perceived several negative characteristics about their work such as challenges and demands of too much work, a lack of freedom to choose the teaching field and tasks at work; underestimation by others of the value of teaching as such; communication breakdown with administrators and the atmosphere in the institute. Other studies also have shown that student teachers often struggle with the complexity and variety of their responsibilities in moving from university to a new learning environment. Therefore, the mentors seem to be the major point of reference in this new situation, for instance, by offering advice about balancing teaching and administrative duties. For this reason alone, the mentors need to be aware of the high status granted to them by the student teachers. (Fairbanks et al 2000, Murray-Harvey et al 2000, see also Cope et al 2000)

### 6.3.1.2 Significance of peer collaboration

*Collaboration with peer students* was a meaning that emerged in many Finnish nurse student teachers’ types. One common type for both the Finnish and British nurse student teachers appeared and was labeled "team teaching with peers". Team teaching with peers fostered the student teacher’s self-confidence as a prospective teacher and taught collaborative skills like listening to other students and arguing own views. The peer support as well as the feeling of responsibility of a joint teaching session was significant in team teaching and in its assessment. In addition, collaborative studies were a positive opportunity to prepare to resolve conflicts that essentially belong to collaborative work. Detailed and supportive peer assessment was considered very significant especially in case that the mentor’s assessment was either very general or focused on only some details of the whole student teacher’s teaching session. On the other hand collaborative studies were demanding and especially the Finnish student teachers had negative experiences during them. The nurse student teachers’ intolerant attitude towards other students and different commitments to learning goals created an unpleasant learning atmosphere. Lack of openness and trust among the Finnish students
was evident. Moreover, the difficulties in peer assessment were caused by the student teacher’s will to be correct or the student teacher’s immature ability to receive feedback.

These results are interesting because collaboration among prospective teachers is often assumed to help in the process of learning to teach (e.g. Clift & Veal 1990, Lemlech & Hertzog-Foliart 1993, Watson 1995, Tossavainen et al 1998). Lemlech and Hertzog-Foliart (1993) noticed in their study that collegial relations among student teachers develop over time and progress through distinct stages including inhibiting and enhancing behaviors. Watson (1995) found out that student teachers valued collaborative learning because of the peer support towards an individual member of the collaborative group in the teaching session. The development of student teachers’ collaboration and creating structures to share knowledge and develop skills in argumentation can be tools for increasing communication among all parties concerned as well as contributing to the student teachers’ emotional and intellectual growth (Clift & Veal 1990). That was realized in Sirkka et al’s (1999) study of the development of nurse student teachers’ scientific thinking in which the use of collaborative teaching and learning methods during the student teachers’ studies improved their argumentation skills. However, this means that the learning environment is non-threatening; where sharing ideas and problem solving is the existing state of affairs; and where the individual member is respected (Knowles 1985, Schamber 1999). Sarja (2000) found that dialogic learning in a small group of Finnish nurse student teachers was hard to achieve and was rare during the teaching practicum phase.

6.3.1.3 Development of self-confidence as an educator

The meanings that were found in the Finnish and British nurse student teachers’ experiences described the development of self-confidence as an educator. This evidenced itself as flexibility in beforehand planning to implement the teaching session and in becoming aware of the reality of teaching and learning environment instead of pure theoretical thinking of teaching and learning. The student teachers had experienced the joy of becoming aware that their didactic thinking and teacher skills had developed while having the opportunity to use clinical expertise in teaching. Moreover, the student teachers experienced positively their development in managing with challenging teaching sessions by careful beforehand preparation and managing with serious stress caused by the teaching practicum. However,
almost opposite meanings compared to positive ones related to the development of self-confidence as an educator emerged. The nurse student teachers had problems with nursing students, who were not interested in concentrating on studying what the student teacher was teaching. The student teachers lack of confidence to be honest and give feedback to the nursing students about the issues that they thought should have needed it. In addition, student teachers felt frustrated themselves in the reflection sessions but had not the strategies to give honest feedback to the university tutors about that. This is very important to take into account in nurse teacher education in order to create learning environments where teacher students may practice giving feedback to learners, colleagues and their educators.

Several research studies show that while student teachers value the teaching practicum highly, they also consider them to be the most stressful part of their studies (e.g. Lemlech & Hertzog-Foliart 1993, Murray-Harvey et al 2000, see also Hatton et al 1994). Murray-Harvey et al (2000) found in their study of stress perceived by student teachers during their teaching practicum that professional coping strategies used in order to avoid stress were being well prepared for lessons as well as the use of other self-management skills like planning and organisational skills. Varila (1999) found in a study on the significance of emotions in adult education that joy is a feeling that provides energy for an individual. A lasting joy emerges from feelings of solidarity and from completing challenging tasks.

Some meanings were related also to the learning environment where the teaching practicum took place. Student teachers felt the closed organizational culture and routine atmosphere in the learning environment of the teaching practicum negatively as well as the problems in the physical learning environment that disturbed the progress of teaching session. Furthermore, the lack of opportunities for teachers to participate in in-service education (updating clinical knowledge) without a decrease in salary achieved the affect that student teachers experienced the learning and prospective working environment negatively. In addition, dissatisfaction related to both the Finnish and British nurse student teachers’ experiences and meanings formulated from them emerged with organising the studies in the teaching practicum learning environment. Dissatisfaction was caused at the initial phase of the teaching practicum because of the mentor’s hurry and inability to concentrate on the student teachers’ studies. Lack of information or difficulties to make contact with the mentor caused unpleasant stress to the student teacher.
The result of this study is similar with the study of Lemlech and Hertzog-Foliart (1993) who found that the development of a collegial relationship between novice and “master” teachers requires time and intensive interaction. It also emerged that time was frequently too limited. Also Scanlan and Chernomas (1997) emphasised that reflective activities take time and commitment.

6.3.2 Types of the use of analysis of critical learning incidents as a teaching and learning method

The types that were formulated on the base of the meanings of the use of the analysis of critical learning incidents as a teaching and learning method described both the usefulness of it as a promoter towards nurse teacher-hood and also the uselessness concerning the growth as a nurse teacher. Both the Finnish and British nurse student teachers experienced that the use of the analysis of the critical learning incidents method fostered their growth as a nurse teacher, but obviously the British students were more goal-oriented in the seminars than the Finnish nurse student teachers, which seems to be situation-orientated. The British student teacher Types describe mostly the reflective activity of sharing experiences and the joint analysis of critical learning incidents with peers as expanding one’s thoughts and deepening learning by becoming aware of similarities and differences which belonged to the different peers’ experiences. The same emerged in some regard in some Finnish nurse student teacher Types, but the situational factors like experience of too much time reserved for reflection and problems in collaboration disturbed reflective discussion and learning. Reasons for this are not clear. It may be that in Britain where the critical incident learning method is used more than in the Finnish nurse teacher education, the tutoring of using this particular teaching and learning method is more traditional and appropriate. Preskill (1997) found that “the critical incidents seemed to have a significant effect on students’ awareness of the multiple perspectives that exist within any group of people”. Wodlinger (1990) emphasises guided reflection in analysing critical incidents because such guided reflection empowers student teachers to assume more direct control over their growth that one experiences during the teaching practicum.

The meanings of the British students described of becoming aware of their emotions and real opinions concerning the experiences they reflected on in the analyses seminars. They felt that
the use of critical learning incident analysis developed their professional knowledge base as nurse teachers and they became aware of the significance of teamwork as a professional skill of a nurse teacher. This seems to imply that reflection has taken place in the critical learning incident analysis seminars because it is well known that emotions are related to learning and particularly in the process of reflection (e.g. Boud et al 1985, Mezirow 1990, see also Rich & Parker 1997). The implementation of the analysis seminar as a collaborative learning process may have activated the student teachers to think about teamwork as a needed skill in the future profession as a teacher. Preskill (1997) found that the use of critical incidents made the student teachers focus more on learning, kept them more actively engaged with the course content and process, and increased their interest and involvement in self-reflection. Moreover, student teachers seemed to discover even more about themselves as learners.

The Types based on the Finnish nurse student teachers’ experiences and meanings formulated from them described the diversity of the students’ experiences related to the same learning situation. Some nurse student teachers considered that the anonymous use of critical learning incidents affected stress levels because they were careful about what they could say in the reflection seminar without insulting peers. While writing down the critical learning incidents the Finnish nurse student teachers considered whether one’s written critical learning incident may be analysed publicly in collaborative reflection seminars and giving written permission for that. Despite this, the public, anonymous analysis caused unexpected stress for those whose critical learning incidents were analysed but also to other nurse student teachers. The Finnish nurse student teachers focused on thinking about if other students recognized the original writer of the critical learning incident and the other students who were analysing the incident were thinking who was the original writer of the incident. On the other hand some nurse student teachers felt that the anonymity in analysing the critical learning incidents was important firstly in order to describe the critical learning incident freely as it really happened and thereafter analyse it freely in the reflection seminar without being revealed. One Type of Finnish nurse student teacher described dissatisfaction of not having her critical learning incident in public analysis. Moreover, problems in collaborative studies amongst the Finnish nurse student teachers did not support open and reflective discussion in the analysis seminar, which was therefore experienced demanding and not fostering deep learning.

The previous literature does not describe the problems in using the critical learning incident anonymously in the reflection seminar. For instance Smith and Russell’s (1991) impressions
of using critical learning incidents anonymously in reflection seminars are that it is appropriate, while sometimes some students indicate that they might like to tell to the peers of being the describer of the experience (see also Brookfield 1996). However, the results of this study show the need to carefully negotiate the ground rules especially the anonymous use of critical learning incidents in particular to the critical learning incident analysis seminar before the session with student teachers. Also helpful is recognizing that each group has its own group dynamics, therefore one group may prefer the use of critical learning incidents anonymously in the analysis seminar whereas the next group may desire the use of incidents with names. The anonymous use of the critical learning incidents may affect on problems if the description of the critical learning incident does not have enough details for other learners for the analysis. In that case speculation may take place instead of connecting analysis and learning through it to the real experiences.

6.4 Conclusions, recommendations and implications for further research

Based on the results of this study the following conclusions and recommendations are suggested:

1) The mentor – student teacher relationship is extremely important during teaching practicum. Although nurse student teachers are adult learners they require concrete support and assistance especially at the beginning of the teaching practicum. To make a concentrated analyses of the student teacher’s learning needs, goals and strategies to achieve them as well as progress assessment during the teaching practicum for the purpose of evaluating whether learning goals are achieved demands time from the mentor as well as from the student teacher. The collaborative mentoring model between university and teacher practicum sites should be systematically developed. Continuous training for mentors should be guaranteed especially in Finland. Quality criteria for mentoring in teaching practices should be developed. Quality of mentoring should be assessed in order to develop high quality nurse teacher education.

2) The collaborative studies during the teaching practicum are in general beneficial both in the development of the substance knowledge of teaching and learning and in the development of skills for team work. Collaborative studies include different phases
that may be very demanding for student teachers, especially the conflict situations. The student teachers’ collaborative learning process should be supported by tutors in regular tutoring meetings in which the progress of collaborative studies will be explicitly discussed and assessed in order to connect the student teachers’ experiences of collaborative learning to the theoretical knowledge of collaboration and so expand and deepen the student teachers’ personal theories of collaboration.

3) Nurse student teachers’ assessment skills and skills to give feedback to learners, peers and educators should be strengthened for the purpose to educate professionals who have abilities to assess the quality of learning as well as the quality of teaching. In this way high quality nursing education and the effects on providing a high quality of nursing services to society can be guaranteed. More emphasises should be placed on giving and receiving feedback in nurse teacher education. This should become one of the learning goals of nurse teacher education.

4) The use of critical learning incident analysis is in general an appropriate teaching and learning method in nurse teacher education. Student teachers become aware of the similarities and differences of experiences and views that different students have related to the same situation. This expands and deepens the student teachers’ theoretical thinking about teaching and learning and develops theory in use as a nurse teacher. Student teachers learn both theoretically and in practicum an important teaching and learning method that they can use as a nurse teacher by integrating the practical and theoretical knowledge of nursing and so integrating the gap between theory and practice in nursing. The experience of the usefulness of the analysis of the critical learning incident in reflection seminars is closely connected to the experiences of collaborative studies: the experience of the uselessness of collaborative studies because of conflicts between student teachers seems to be in connection with the experience of the uselessness of the critical learning incident analysis, especially if the conflicts are not seen as challenges to be solved during the learning process. For the purpose of creating a non-threatening learning environment it is extremely important to establish ground rules between tutors and student teachers. This will assist the student teachers’ real life experiences and form the foundation for learning conducted through the analysis to deepen knowledge and theoretical thinking of teaching and learning issues.
According to the recommendations above, the results of this study can be used in developing the nurse teacher education programmes and the practices of the student teachers' teaching practicum. The results of this study described the critical learning incidents and their use in reflection seminars in nurse teacher studies in Finnish and British programmes. The results can be applied also in other fields of teacher education in the development of the teaching practicum as well as the use of the method of critical learning incident analysis.

In future research it is important to examine the role of the supervising university tutors in the process of the nurse student teachers' practicum work. It is important to clarify why some students experience the collaborative studies negatively and if there are factors that can be anticipated and processed explicitly in the tutoring process conducting to student teachers' commitment to further collaborative studies. In addition it is important to investigate the meaning of whether to use critical learning incidents in reflection seminars anonymously or not and the related advantages and disadvantages. More evidence is needed whether the use of critical learning incident analysis conduces to increased in-depth learning compared to other student centred teaching and learning methods. This could be clarified by an educational intervention with the systematic use of the critical learning incident analysis in the student teachers' studies in an experiment comparison design. More methodological knowledge is needed about the use of qualitative research methods in educational nursing research. Ethnography might be one applicable approach to investigate phenomenon in international nursing educational contexts to be able to make more cultural specific conclusions.
REFERENCES


Morse J. 1999a. The role of data. Qualitative Health Research 9(3), 291-293.


Silén-Lipponen M., Turunen H., Tossavainen K. 2001. Experiences of collaboration in operating room by the operating room nurses perspective. Accepted for publication in Journal of Nursing Administration.


### Table. The use of critical incidents in educational research

<table>
<thead>
<tr>
<th>Researcher(s)</th>
<th>Purpose</th>
<th>Material and methods</th>
<th>Main results</th>
</tr>
</thead>
<tbody>
<tr>
<td>Care</td>
<td>To identify the learning needs of Resident Care Coordinators</td>
<td>Coordinators (N=9)</td>
<td>Conflict management 39%, Motivation / Team building 27%, Performance appraisal 11%</td>
</tr>
<tr>
<td>Nursing 1996</td>
<td>Written critical incidents</td>
<td>Time management 6%</td>
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<tr>
<td>Canada</td>
<td>Qualitative and quantitative classification</td>
<td>Change 6%</td>
<td></td>
</tr>
<tr>
<td>Cooper</td>
<td>To compare the effects of a field-based methods with a traditional university-based methods in on mathematics teacher education</td>
<td>A case study of 2 students</td>
<td>Student with field-based methods was more reflective compared to student with traditional university-based student</td>
</tr>
<tr>
<td>Mathematics</td>
<td>Written critical incidents, videotaped lessons</td>
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<tr>
<td>1996 USA</td>
<td>Stimulated recall sessions</td>
<td></td>
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<tr>
<td>Dachelet et al</td>
<td>To determine the viability of the critical incident technique as a method for studying the factors influencing the learning in clinical practice</td>
<td>Nurse students (n=12)</td>
<td>Positive:</td>
</tr>
<tr>
<td>Nursing 1981</td>
<td>Nurse preceptors (n=5)</td>
<td>The critical incident technique provided a broad picture of what activities were occurring in the clinic and how they</td>
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<tr>
<td>USA</td>
<td>Physician preceptors (n=4)</td>
<td>were perceived by those learning and teaching there:</td>
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<td></td>
<td>Semi-structured interviews during 3 data collection periods (320 critical incidents)</td>
<td>Negative:</td>
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<td></td>
<td>Qualitative and quantitative classification</td>
<td>Variation in the number and in the extent of specificity of the incidents reported between the participants</td>
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<tr>
<td>Kain</td>
<td>To investigate the conditions encouraging and discouraging teacher collaboration</td>
<td>Teachers (N=85)</td>
<td>Conditions of encouraging:</td>
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<tr>
<td>Education 1997</td>
<td></td>
<td>Individually or group interviews of critical incidents</td>
<td>*Time, training, organizational support</td>
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<tr>
<td>USA</td>
<td>Qualitative and quantitative classification</td>
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<tr>
<td>Lee</td>
<td>To identify and rank stressful clinical and didactic situations during nurse education</td>
<td>Nurse students (N=111)</td>
<td>Conditions of discouraging:</td>
</tr>
<tr>
<td>Nursing 1987</td>
<td>Written critical incidents</td>
<td></td>
<td>*Lack of support, pressures to cover curriculum and conduct testing</td>
</tr>
<tr>
<td>USA</td>
<td>Qualitative and quantitative analysis</td>
<td>Stressful clinical experiences:</td>
<td>*Traditions of tracking and separate-subject instruction</td>
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<td></td>
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<td>Patient care</td>
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<td>Assignment to a specific agency, service unit</td>
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<td>Relations with staff</td>
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<td>Relations with instructor</td>
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<td>Evaluation of clinical performance Schedules</td>
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<td>Pressure to function as a registered nurse</td>
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<td>Inadequate instruction</td>
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<td>Stressful didactic experiences:</td>
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<td>Examinations and grades</td>
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<td>Pressures of schedules, assignments and studying</td>
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<td>Recitation</td>
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<td>Relations with instructor</td>
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<tr>
<td></td>
<td></td>
<td>Inadequate instruction</td>
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<td></td>
<td></td>
<td>Didactic incidents were reported more frequently than clinical incidents</td>
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<tr>
<td>Researcher(s)</td>
<td>Purpose</td>
<td>Material and methods</td>
<td>Main results</td>
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<tr>
<td>Minghella &amp; Benson Nursing 1995 UK</td>
<td>To describe the contents of critical incidents of mental health nurse students</td>
<td>Mental health nurse students (N=8) Written critical incidents Questionnaire with open-ended questions</td>
<td>Contents of the incidents: Role conflict Sexuality Suicide / deliberate self-harm Feelings of incompetence Lack of assertiveness Power Student status Communication with staff and clients A questioning approach to mental health care Evaluation of the method: Effective method of enabling critical reflection Useful in integrating theory and practice</td>
</tr>
<tr>
<td>Obara, Takahashi &amp; Nakazawa Teacher education 1993 Japan</td>
<td>To understand student teaching situation</td>
<td>Student teachers (N=88) Critical incident questionnaire (I after one week teaching practice, II at the end of teaching practice) Qualitative and quantitative coding</td>
<td>*Questionnaire I: Relations with pupils 17% Dealing with pupils with problems 11% Dealing with individual differences in teaching 9% Understanding pupils 9% Relations with school teachers 9% Teaching methods 7% Busy teaching conditions 7% School Activities 6% *Questionnaire II: Teaching methods &gt; 10% Relations with pupils 10% Understanding pupils 8% Dealing with pupils with problems 6% Home room management 6% Relations with school teachers 6% Family and local environments 6%</td>
</tr>
<tr>
<td>Perry Nursing 1997 UK</td>
<td>To investigate issues of working lives of registered nurses</td>
<td>Nurse students (N=41) Written critical incidents a part of assignments Qualitative and quantitative analysis</td>
<td>Life-or-death situations (6=12) *resuscitation events Differences in opinions (6=17) *between nurses, other professionals, patients Sub optimal practice (6=19) *poor care, unprofessional behaviour, ineffectual management</td>
</tr>
<tr>
<td>Pilhammar Nursing 1995 Sweden</td>
<td>To discover and describe the feelings of the students about their situation as students and the strategies students develop for coping with this situation</td>
<td>Nurse students (N=41) Written critical incidents (6=79) Inductive categorization</td>
<td>Positive experiences Experience of being in the interaction between *academic and practical demands *being a student and a professional worker Different strategies: Conforming to student behaviour Alliances with doctors Withdrawal</td>
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<tr>
<td>Researcher(s)</td>
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<tr>
<td>Prekshill</td>
<td>Teacher education</td>
<td>1997</td>
<td>USA</td>
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<tr>
<td>Smith</td>
<td>Nursing</td>
<td>1998</td>
<td>UK</td>
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<tr>
<td>Sims</td>
<td>Nursing</td>
<td>1976</td>
<td>UK</td>
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<tr>
<td>Wollinger</td>
<td>Teacher education</td>
<td>1990</td>
<td>Canada</td>
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<td>Researcher(s)</td>
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<td>Wong</td>
<td>Nursing</td>
<td>1978</td>
<td>Canada</td>
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<tr>
<td>Wong &amp; Lee</td>
<td>Nursing</td>
<td>2000</td>
<td>Hong Kong, China</td>
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</tbody>
</table>
Table. The use of critical incidents in nursing research

<table>
<thead>
<tr>
<th>Researchers(s)</th>
<th>Field</th>
<th>Year</th>
<th>Country</th>
<th>Purpose</th>
<th>Material and methods</th>
<th>Main results</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beech &amp; Norman</td>
<td>Psychiatric nursing</td>
<td>1995</td>
<td>UK</td>
<td>To develop indicators of high- and low-quality psychiatric nursing</td>
<td>Psychiatric patients (N=24)</td>
<td>Handling violence, disturbance 10%</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>To test the CIT (critical incident technique) method</td>
<td>Interview</td>
<td>Communicating caring 41%</td>
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<td></td>
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<td></td>
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<td></td>
<td>Qualitative and quantitative content analysis</td>
<td>Respect 17%</td>
</tr>
<tr>
<td>Burns &amp; Harm</td>
<td>Emergency nursing</td>
<td>1993</td>
<td>USA</td>
<td>To determine the types of clinical events perceived as critical in emergency nursing</td>
<td>Emergency nurses</td>
<td>Ward atmosphere 5%</td>
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<td>I Structured questionnaire (N=682)</td>
<td>Nursing numbers 7%</td>
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<td>II Interview (N=26)</td>
<td>Nurses attributes 20%</td>
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<td>Statistical analysis</td>
<td>The CIT fulfilled its potential as an interactive method of eliciting the views of psychiatric patients</td>
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<td></td>
<td></td>
<td>Qualitative content analysis</td>
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<tr>
<td>Cheek, O’Brien, Ballantyne &amp; Pincombe</td>
<td>Aged care</td>
<td>1997</td>
<td>Australia</td>
<td>To describe critical aspects of nursing work in aged and extended care</td>
<td>Nurses (n=15), residents (n=6) and their families (n=6), allied health personnel (n=3), (N=30)</td>
<td>Holistic care 34%</td>
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<td>Interview</td>
<td>Physiological care 24%</td>
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<td></td>
<td>Qualitative and quantitative content analysis</td>
<td>Psycho social care 21%</td>
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<td>Psycho emotional care 12%</td>
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<td></td>
<td>Socio-political issues 9%</td>
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<tr>
<td>Cohen &amp; Sarter</td>
<td>Oncology nursing</td>
<td>1992</td>
<td>USA</td>
<td>To obtain a better understanding of how nurses caring for patients with cancer view their work</td>
<td>Nurses (N=23)</td>
<td>Focus on acute physiologic emergencies</td>
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<td></td>
<td>Interview</td>
<td>How the cancer nursing relate to their own lives</td>
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<td>Participant observation (approximately 200 hours)</td>
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<td>Phenomenological analysis</td>
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<tr>
<td>Researchers(s)</td>
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<td>Material and methods</td>
<td>Main results</td>
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<tr>
<td>Cox, Bergen &amp; Norman</td>
<td>Cancer nursing</td>
<td>1993</td>
<td>UK</td>
<td>To explore consumers’ perceptions of the Macmillan nurse’s work (palliative care)</td>
<td>Patients (n=8) Health care professionals (n=12) Qualitative and quantitative content analysis</td>
<td>Results related to critical incident technique: The recount of incidents depend largely on subjects’ ability to recall events, therefore authenticity is difficult to verify Overall the CIT emerged as an appropriate method for the research setting</td>
</tr>
<tr>
<td>Grant, Reimer &amp; Bannatyne</td>
<td>Long-term care</td>
<td>1993</td>
<td>Canada</td>
<td>To identify the indicators of quality of long-term nursing care</td>
<td>Residents (n=52) Significant others (n=58) Nursing staff (N=37) Interviews Altogether 929 incidents’ Qualitative content analysis</td>
<td>Nature of facility Nature of relationships Acknowledgement of the personhood of the resident Nature of communication with residents Disposition of decision making Judgements about assistance required Degree and nature of surveillance Presence of planning and judgment about care Nature of communication of the health care team Do or assist with activities of living which residents cannot do for themselves Do or assist with therapeutic activities which residents cannot do for themselves Manner in which activities of living and therapeutic activities are carried out Nature of interaction with significant others Provision, use and attributes of resources</td>
</tr>
<tr>
<td>Kemppainen, O'Brien &amp; Corpuz</td>
<td>Long-term care</td>
<td>1998</td>
<td>USA</td>
<td>To identify the behavioral responses of hospitalised patients with HIV/AIDS</td>
<td>Patients (N=118) Interviewing critical incidents (F=273) Inductive content analysis</td>
<td>10 major response categories: participate, anger, appreciate, come close, stay away, match respect, match disrespect, depend, complaint, self care</td>
</tr>
<tr>
<td>Koponen, Perałá &amp; Rääkkönen</td>
<td>Long-term care</td>
<td>2000b</td>
<td>Finland</td>
<td>To evaluate women’s experiences of care</td>
<td>Women (N=2189) Written critical incidents Content analysis Quantitative analysis</td>
<td>The most positive experience was described by 1028 women and the most negative experience by 1058 women. The contents of the critical incidents related to interaction, personal characteristics of caregivers, autonomy, results of care and woman’s own well-being</td>
</tr>
<tr>
<td>Researchers(s) Field Year Country</td>
<td>Purpose</td>
<td>Material and methods</td>
<td>Main results</td>
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<tr>
<td>Malin Community nursing 2000 UK</td>
<td>To examine how clinical supervision was interpreted, operated, benefits supervisee and contributes supervisor</td>
<td>Nursing staff (N=6) critical incidents Observations Nursing staff (N=11) interviews</td>
<td>Purpose and progress of session Outcome of session</td>
<td></td>
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</tr>
<tr>
<td>Martin 1998a UK</td>
<td>To develop a model of communication model</td>
<td>Nurses (N=20) Written critical incidents concerning the issue of advocacy from their practice</td>
<td>Three main areas emerged as problems: paternalism dependency language</td>
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<tr>
<td>Martin 1998b UK</td>
<td>To describe the issues related to the issues around the need to empower dying patients</td>
<td>Nurses (N=30) Written critical incidents</td>
<td>The nurse is able to intervene and enable the patient to take a degree of control by variety of methods e.g. empathy.</td>
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<tr>
<td>Post Perioperative nursing 1996 Finland</td>
<td>To describe the ethical dilemmas that arise in perioperative nurses’ practice</td>
<td>Anaesthetic (n=48) and operating theatre (n=76) nurses Interview 124 descriptions of critical incidents Qualitative and quantitative analysis</td>
<td>Ethical dilemmas arise from: value conflicts in the intraoperative phase of surgery the patients’ right to self-determination caring for the patients the allocation of scarce resources and need for increased effectiveness</td>
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<tr>
<td>Reed Elderly care 1994 UK</td>
<td>To examine expertise in long-term care of elderly patients</td>
<td>Nurses (n=3) Semi-participant observations Interviews</td>
<td>The nurses were not able to describe specific incidents for phenomenological study but general approaches, principles and philosophies of care</td>
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</tr>
<tr>
<td>Rimon Rehabilitative nursing 1979 Israel</td>
<td>To describe nurses’ perception of their psychological role in treating rehabilitation patients</td>
<td>Practical and registered nurses (N is not mentioned) Interview Qualitative content analysis</td>
<td>Nurses roles: To be able to anticipate and meet the emotional needs of the patient To establish a relationship and communication with the patient To encourage patient’s self-reliance and independence</td>
<td></td>
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<tr>
<td>Researchers(s)</td>
<td>Field</td>
<td>Purpose</td>
<td>Material and methods</td>
<td>Main results</td>
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</tbody>
</table>
| Sillén-Lipponen, Turunen, Tossavainen, Smith & Russell | Operating room nursing | To describe operating room nurses’ experiences of collaboration through critical incidents | Operating room nurses (N=21) | Three different types of collaboration in operating room nursing:  
* Patient’s needs  
* Demands towards team  
* Demands towards the individual nurse |
| | Finland | | Written descriptions (n=15) | |
| | | | Interviews (n=6) | |
| | | | Descriptive phenomenological method | |
| Strömberg, Broström, Dahlström & Frilund | Nursing in internal medicine clinics | To identify factors influencing compliance with prescribed treatment in patients with chronic heart failure | Patients (N=25) | Two main areas emerged; inward and outward factors.  
The inward factors relate to the personality of the patient, the disease and the treatment.  
The outward factors relate to the social activities and relationships and health care professionals |
| | Sweden | | Interviews, 265 critical incidents | |
| | | | Qualitative analysis | |
| Timpka, Svensson & Molin | Community nursing | To identify and analyse dilemmas that district nurses face in their work | District nurses (N=153) | Dilemmas related to:  
* Coordination of care (36%)  
* Direct patient care (27%)  
* Difficulties in communication with patients and their relatives (29%)  
* Planning of their own work (17%) |
| | Sweden | | Qualitative and quantitative analysis | |
| Wahlin, Wieslander & Frilund | Ambulance serving | To find out how loving care was practiced in one ambulance service | Paramedics (N=12) | The paramedic shows:  
* Proof of cognisance  
* Solitude towards the patient  
* Empathy towards patient. |
| | Sweden | | Written critical incidents | |
| | | | Qualitative content analysis | |
APPENDIX 3

LEARNING FROM CRITICAL INCIDENTS
INFORMATION FOR STUDENTS

Dear Health Care Teacher Student,

According to Brookfield (1990) “critical incidents are brief descriptions by learners of significant events in their lives”. Now we are asking you to describe your significant events during your teaching practice. Please, think back over the teaching practice. During that time, what event made you as a Health Care Teacher Student feel a real satisfaction. A time when you thought “this is what makes it all worthwhile”. Write a description of the positive event with details of what happened, when and where it happened, who was involved (roles, functions, use job titles rather than names of individuals). Similarly, think back what event made you feel a real dissatisfaction and describe this negative event also.

Please write your name on both sheets where you describe your incidents. No names will be used in seminars related to the incidents. You are asked to mark your name for the research purposes if we need more information from you. You can also mark it at the end of your written descriptions if you refuse to use your incidents in seminar.

Learning from Critical Incidents research project:
This is a part of a research project between University of Northumbria at Newcastle and University of Kuopio in Finland. The purpose of the project is to develop and evaluate learning and teaching methods in Health care Teacher Education. By describing your significant events, you will give important information for the investigation. However, you are free to forbid the use of your critical incidents in the research project. You can be sure, that no identification to any person can be made by results of the study.

The contact person at the University of Kuopio is:

Hannele Turunen, RN, MNSc, Doctoral student
Department of Nursing Science
PO Box 1627
70211 Kuopio, Finland
An example of the data analysis of a Finnish nurse student teacher’s written critical incident

PHASE 1: Sense of the whole experience

Raw data

Vierailuni X:n terveydenhuolto-oppilaatoksessa on ylivoimaisesti positiivisin kokemukseni OROPEHA -kurssilla. Olin opiskelutoverini kanssa sopinut entisen luokanvalvojani (sattumaalta myös kaverini entinen luokanvalvoja) kanssa päivähjelmasta ja sen suunnittelua lähti todella meidän tarpeistamme. Olimme mukana parilla oppitunnilla ja ohjaava opettajamme laittoikin meidät yllättäen kertomaan opiskelustamme. Emme ehtineet jännittää, joten homma meni nappiin ja ”kuulijat” olivat tyytyväisiä. Yleensä ottaen ohjaajamme valoi meille luottamusta itseemme ja sai ainakin minut huomaamaan, että opettajien ammatti on pakerruksen (lue opiskelum) arvoinen.

PHASE 2: Discriminated meaning units
Dividing the data into the meaning units (MU)

MU1 Vierailuni X:n terveydenhuolto-
oppilaitoksessa on yli voimaisesti positiivisin
kokemukseni OROPEHA -kurssilla. Olin
opiskelutoverini kanssa sopimut entisen
luokanvalvojani (sattumalta myös kaverini
entin luokanvalvoja) kanssa
päiväohjelmasta ja sen suunnittelutähtä
della meidän tarpeistamme.

MU2 Olimme mukaan parilla oppituomilla ja
ohjaava opettajamme laatikoikin meidät
ylittäen kertomaan opiskelustamme. Emme
ehnäteet jännittävät, joten homma meni nappiin
ja "kuulijat" olivat tytyväisiä.

MU3 Yleensä ottaen ohjaamme valoi
meille luottamusta itsemme ja saa ainakin
minun huomaamaan, että opettajan ammatti
on pakerrusen (lie opiskelun) arvoinen.

MU4 Sainme kyllästä häneltä alue mitä
mieleen putkihi ja hän kerto meille
avoimesti faktioja... mikä on raskasta, mikä
pääni ja kuitenkin hän jakoi korostaa, että
Kaikesta huolimatta työ on todella antoisaa.
Tämä tuli todella tarpeeseen, sillä aiemmin
moneen otteeseen oli kuullut vain työn njerät
puolet puolet ja mille kaikki vannoiva, että
ainakin tulos opettajan työssä on burn out!

MU5 Vierailuni aikana sain vahvistusta
ajatukillei, että kun työn ottaa haasteena
ja kehittymisdokumenttina, jaksaa aina
välillä verity aikamaissiin suorituksilla.

PHASE 3: Transformed meaning
units (TMU)
Search for essences of the meaning
units and transformation into the
language of the discipline (nursing
didactics)

TMU1 O:n tutustumisen
vertaisen kanssa th.oppilaitokseen toteutui
heidän asettamiensa tavoitteiden
perustelle.

TMU2 O ja hänen vertaisensa
osallistuvat oppimistilanteisiin, jolloin
mentor etukäteen varoittamatta pyysi
heitä kertomaan opiskelijoille
opettajaksi opiskelusta. Tilanne oli
luonteva ilman etukäteisjännitystä ja
opiskelijat olivat tyttäreiä.

TMU3 Mentorin suhtautuminen
kehittii O:n ja vertaisen itseluottamusta
ja O tiedostoi opettajaksi opiskelun
tärkeän merkityksen.

TMU4 O ja vertainen keskustelivat
avoimesti opettajan työstä. Mentor
kertoi rehellisesti työn vaatimuudesta
ja antoisudesta. O:lle keskustelu oli
tärkeä, koska aiemmissa kokeutuksissa
olivat korostuneet opettajan työn
raskaus ja todennäköisyys sairastua
burnouttiin.

TMU5 O:n näkemykset vahvistuivat
opettajan työn myönteisestä
haasteellisuudesta ja mahdollisudesta
kehittä itseään, mikä edisti
kausiin osoitettu hyvin määrin
hallintaa.

TMU6 O muistaa mentorin
näkemyksen opettajan työn
voimavaroista ja työn merkityksestä
ci opiskelijat voimavaran ja työn
tavoitteena.

TMU7 O:lle ja vertaiselle oppimisympäristö oli myönteinen, koska mentorit pitivät heitä kollegoina, mikä ilmeni pienissä asioissa.
PHASE 4: Specific description of situated structure
Synthesis of the transformed meaning units into a consistent statement

Student teacher’s and her peer’s goal orientated learning was supported by a mentor who discussed openly about teacher’s work with teacher students and organized them learning opportunities during their visit. The mentor confirmed teacher student’s views about the positively challenging nature of nurse teacher’s work and was collegial towards nurse teacher students.

PHASE 5: General structural description or types of general structural descriptions
Synthesis of all the participants’ specific descriptions of situated structures

MENTOR’S COLLEGIAL ATTITUDE TO ORGANIZE LEARNING OPPORTUNITIES STRENGTHENING STUDENT TEACHER’S TEACHER IDENTITY AND MOTIVATION TO SELF DEVELOPMENT
Mentors’ collegial attitude towards student teacher and taking account of the student teacher’s learning goals promotes the development of her teacher’s identity and motivate the student teacher to further education.

(1A, 2A, 9A, 10A, 14A, 15A, 16A, 21A: The specific description of a situated structure of eight nurse student teachers’ was included in this type of general structural description).
An example of the data analysis of a British nurse student teacher’s written critical incident

PHASE 1: Sense of the whole experience

Raw data

My first teaching session in this placement involved P2000 students. The subject involved nursing care of the Asthmatic patient, a subject I am very familiar with from my clinical area. So, I was quite confident about the content of the session, but with it being my first session I was very nervous about my teaching style & presentation. The session lasted approx. 2 hours and I was convinced that I would never remember everything that I wanted to say, so I wrote everything down, like a script. This script covered every eventuality I could think of, just in case a student asked me awkward question. I was also very conscious of my “newness” in the teaching environment and, as such, felt very vulnerable. I did not want to convey this to the students, so I really had to think hard to control my body language. At the end of the session, I asked the students to evaluate my performance, etc. using the U.N.N. standard evaluation questionnaire. To my surprise, the session evaluated very well, with comments such as, “the session flowed very well”, “relevant up-to-date information from a proper nurse”, “an easy, going -relaxed atmosphere” & “good teaching style”. As you can imagine, this did wonders for my confidence, as I thought “this is it, I’ve cracked it”. The power & relevance of positive feedback, at this stage in my placement gave me the confidence & support to carry on in a similar vein.
PHASE 2: Discriminated meaning units
Dividing the data into the meaning units (MU)
MU1 My first teaching session in this placement involved P2000 students. The subject involved nursing care of the X patient, a subject I am very familiar with from my clinical area. So, I was quite confident about the content of the session,

but with it being my first session I was very nervous about my teaching style & presentation.

MU3 The session lasted approx. 2 hours and I was convinced that I would never remember everything that I wanted to say, so I wrote everything down, like a script.

MU4 This script covered every eventuality I could think of, just in case a student asked me awkward question.

MU5 I was also very conscious of my “newness” in the teaching environment and, as such, felt very vulnerable. I did not want to convey this to the students, so I really had to think hard to control my body language.

MU6 At the end of the session, I asked the students to evaluate my performance, etc. using the U.N.N. standard evaluation questionnaire.

MU7 To my surprise, the session evaluated very well, with comments such as, “the session flowed very well”, “relevant up-to-date information from a proper nurse”, “an easy, going -relaxed atmosphere” & “good teaching style”.

MU8 As you can imagine, this did wonders for my confidence, as I thought “this is it, I’ve cracked it”. The power & relevance of positive feedback, at this stage in my placement gave me the confidence & support to carry on in a similar vein.

APPENDIX 5 (2/3)

PHASE 3: Transformed meaning units (TMU)
Search for essences of the meaning units and transformation into the language of the discipline (nursing didactics)
TMU1 S was competent to teach the topic of S’s first teaching practice because of S’s clinical experience.

TMU2 However, S was not experienced to act as a teacher, therefore S was nervous.

TMU3 Before the session S was sure that S will not remember all what S planned to present, therefore S made notes for herself.

TMU4 This notes included all S knew of the topic also all possible answers to students’ possible questions.

TMU5 S was conscious that S was not very experienced teacher and therefore unsure. However, S wanted to control her inexperience as a teacher so that it would not be visible to the students.

TMU6 After the session S asked students to evaluate S’s teaching by a generally accepted instrument.

TMU7 S got positive feedback from both the validity of the content and S’s teaching style and the flexible atmosphere in the learning environment.

TMU8 Students’ positive feedback increased much S’s confidence to continue studies to became a nurse teacher.
PHASE 4: Specific description of situated structure
Synthesis of the transformed meaning units into a consistent statement

S was competent to teach the topic of S’s first teaching practice because of S’s clinical experience, but inexperience as a teacher made S nervous. S expected not to remember all the issues in the real situation that she planned beforehand to present, therefore S made notes including all S knew of the topic and all possible answers to students’ possible questions. S was conscious that S was not very experienced teacher and therefore unsure. However, S wanted to control her inexperience as a teacher so that it would not be visible to the students.

After the session S asked students to evaluate S’s teaching by a generally accepted instrument. S got positive feedback from both the validity of the content and S’s teaching style and the flexible atmosphere in the learning environment. Students’ positive feedback increased much S’s confidence to continue studies to became a nurse teacher.

PHASE 5: General structural description or types of general structural descriptions
Synthesis of all British participants’ specific descriptions of situated structures

CAREFUL PREPARATION BEFORE TEACHING SESSION
Lack of confidence in teaching skills, while being expert in the subject, achieves a very careful preparation of the content of the teaching beforehand and conducts to a successful implementation of teaching and learning.

(1A, 8A: The specific description of a situated structure of two nurse student teachers’ was included in this type of general structural description).
PHASE 2: Discriminated meaning units
Dividing the data into the meaning units (MU)

MUI H: Äskä jo puhuttin siitä, että siihen, tähän merkityksellisten oppismiskokemusten analyysihoaillaan kuuluisi se kirjoittamisasia ja sitten se seminaaripäivä jossa käsitellään niitä kirjoituksia, niin millaisia mielikuvia tai miten sinä, X koet just tämän kirjoittamisprosien?

O: No kyllähän se hyvä kokemus tavaltaan väenpänin siitä, että siihen, mistä saisi lyhen ja sopivan vai se kinkä todella sitten itseelle tuntu esimerkiksi negatiivisena kokemuksena ?? minullahan on aika pitkä tämä negatiivinen kokemus. Sitten minä loppuuen lopuksi minä päätän siihen kun itse asiassa se oli niinkuin minulle semmoineen merkittävän kokemus ja tietyistä mieltä siitä, että lähteekö tämä siitä, että niinkuin kuvioista liikkeelle nähä molemmat mitkä on, mutta kuitenkin sitten sitä ajattelee että no ne ne nyt on semmoista jotka nousee sieltä monien joukosta. ?? kyllä minusta on hirveän hyvä että siinä niinkuin väisinkin joudut reffkeitoamaan vaikka itseasiassa minä olen semmoinen tyypin joka vahvan reffkeitoitu liikasinkin mutta sitten vielä kun järjestää ?? vielä niinkuin järjestämään ja ajattelemaan sitä kokemusta olis niin negatiivinen tai positiivinen. ?? minusta ihan hyvä.

MUI2 H: Koito sinä, että kirjoittaminen on semmoineen tapa jolla sinä pystyt tämäsiastei asioita ilmaisemannen vai ?

O: No kyllä. Minä olen joskus kirjoittanut varta vasten jonkun asian purkaavesti. Että se on ?? Kyllä tietyistä puhuminenkin on mutta ehkä kirjoittaessa tämän prosessin siltä tavalla jészentelee ?? pelkästään sitten juisita koska kuitenkin tässä mietit siitä

1phase 1 sense of the whole experience: raw data is presented in the phase 2 already divided into the meaning units

APPENDIX 6 (1/16)

PHASE 3: Transformed meaning units (TMU)
Search for essences of the meaning units and transformation into the language of the discipline (nursing didactics)

TMU1 O:sta oli tarkoituksenmukaista pohtia opetusharjoitettulokemuksean merkityksellisen kokemuksen analyysia varten ja valita useasta kokemuksesta merkittävä kuvattavaksi kirjallisesti. Annetu oppimistehtävä edisti reflektointia.

TMU2 O:stä on mielestäni kuvata ja jäsentää kokemuksia kirjallisesti sekä pohtia yleistä teoreettisesta mallia, jolla kokemusta voi selittää.
että pitää kuitenkin mennä pidemmälle kuin se pelkäät että minä niinkuin kerron sen tai
ehän ei, en tiedä. Edellisessä sinä sitä odotit
että sitä niinkuin nousaisi vähän teorian
tasolle, niin sitä ehkä tässäkin mietti sitä? että
minun pitää kuitenkin tehdä sitä jotain
johtopäätöksiä ja jotain niinkuin että se ei
ole vaan se juttu. Ehkä se olisi riittänyt
pelkästään se joku juttu ja hyvin lyhyesti ?? Etta
vaikka ne äkkiteltään tuntuivat aikaa semmoiselta
yleiseltä mutta sitten kun niitä ryhmässäkin
rupeaa miettimään, niin ei se olekaan että
niistä löytyy hirveästi asioita
H: Olisiko sinulla muuta tähän
kirjoittamisasiasta liitynyt?
V: No ei oikeastaan. En tiedä onko se sitten
hyvä, että siinä on se toive että nostaisi sen
teorian tasolle. Ainakin olin hyvä kokemus silloin
ekä järjesti että todella mietti että mitä tässä
taustalla ?? jonkun tieteen ala oli se
psykologia tai ?? niin on niin että osisko,
löytysikö jotain semmoista, se on tavallaan
aika hyväkin kyllä. ?? pidemmälle.

**MU3**

H: Joo. Entäs ihan semmoinen, ne
seminaaririnanteet. Mitenkä sinä koit? Niitähan
on nyt kaikki ollut. Ensimmäinen oli Silloin
ensimmäinen vuoden keväällä ja sitten toinen
oli toisen vuoden keväällä?
V: Nämä. Minuta ne olivat ihan hyviä. Että ehkä se
just että vähän niinkuin nousee sieltä omista
kokemuksista ja sekin että mieltii että kakahan
sen on kiertämat ja kenenkään kokemus
tämä on. Ehkä niinkuin niistä mitä sitten oma
ryhmä käsittelee niin kyllä ne sitten niinkuin
silleen selvää sitten tai ainakin luulen, että ne
selviä että ihan se kirjoittamisen ja kokemus.
Minusta se oli niinkuin ihan hyvin että
esimerkiksi tuli sitä keskustelua ja just se
ensimmäinen oli semmoinen että silloin oli,
ilmeisesti oli aika pitkä vali että meidän ryhmää
ei olleet tavannut ja meillä oli ongelmia tähän
yhteistoiminnallisuuden kanssa niin sittenhän
ne purkautu siinä taas

**TM3**

O koki merkityksellisten
kokemusten analyysiseminaarit
mielekkäään, koska tarkastelun
lähtökohtana oli opiskelijoiden
kokemukset. O:n
pienaryhmemäkestelussa tuli esille
erilaisia näkökulmia
käsiteltävän
tapaukseen. Analyysiseminaarissa
käsiteltiin opiskelijaryhmillä tärkeää
asiaa eli yhteistoiminnallisen opiskelun
toteutumista ja ongelmia, mitä
tavaalla
tulivat ylimääräisine käsiteltäväksi.
Mutta myös analyysin valittujen
tapausten käsittelevä olivat riittävä.
kerran esille ja olisi ollut tietysti kauheasti niitä asioita opettajille että se vähän tietysti häirisi sitä mutta ei nyt liikaa että kyllähän se tuli, tuli sitten niistä itse asioistakin keskusteltua.

MU4 H: Voitko vielä tarkentaa sitä, että kun sanoit, että se vähän häirisi sitä että mikä häirisi?
O: Niin se että kun sitten yhtäkkää keskustelu menikin tähän yhteistoiminnallisuuteen ja siihen että tarvitaan apua siinä että ei pärjääkään ??ryhmässä ja sitten kun oli esimerkiksi jotakin henkilökohtaisiaakin tärkeitä antipatiaita jotka oli niinkuin minun ja yhden henkilön välillä semmoiset jotka niin mulle jää hyvin mieleen siinä niinkuin jälkikäteen, niitä ei pitkään aikana unohta että mitä juommoisessa ryhmässä tapahtui, ehkä opettajienkin välillä oli jotain jännitteitä, mutta ei kaikki tietystä tärkeitä huomaakseen. Ei se niinkuin kokonaisuutta paljon häirinnyt mutta kuitenkin ne todelliset tarpeet mitkä sillä hetkellä on akuudteja niin ne sitten ryöpsähdää siinä esille.
H: Niin joo
O: No kai ne on sitten vaan käsiteltävä siinä tämänkin asiän jokouksa.

MU5 H: Kyllä. Miten sinä koit kokonaisuutena sen ensimmäisen tilanteen että tuliko ne myöskään ne akuutit asiat käsiteltävät?
O: No siinä nyt kävi niinkuin aina kävi että me ei niinkuin saatu vastakohtaa siinä, että todennäköisesti se sitten tai siinä nyt viimeistään minullekin selvissi se, että se, ajatellaan että me ollaan aikuisia ja meidän pitää itse pystyä käsittelään mutta ei me koskaan pystyty jälkikäteen käymään että ne kyllä jää sitten, ehkä me sitten opittiin niistä, kyllä me aika rankkoja koettiin melkein koko ryhmä. Ehkä se sitten jatkossa on niinkuin kiva vetää niitä ryhmiä ja kurssseja että miten toimisi että ??niinkuin ennakoon antaisi ihmisille jo tietoa siitä

TMU4 O koki analyysiseminaarissa häiritsevänä sen, että opiskelijoiden senhetkiset tärkeät ryhmäprosesseihin liittyvät asiat nousivat tärkeinä esille ja tavallaan sivuttivat etukäteen analyysin kohteeksi valittu tapaukset joksikin aikaa.

TMU5 O kokee, että opiskelijat ovat saaneet opiskella yhteistoiminnallisissa ryhmissä liian itsenäisesti saamatta riittävästi tukea konfliktitilanteiden ratkaisemisessa ja opiskelu koettiin voimavaroja kuluttavana. Osta olisi todella tärkeää perehdyttää opiskelijat yhteistoiminnalliseen työskentelyyn teoriassa ennen kuin he aloittavat itse opiskelunsa yhteistoiminnallisesti, jotta välitytässin vertaisten väliseltä kilpailulta.
yhteistöiminnallisuudesta ja erilaisista ihmisistä ja tavoista toimia ja että niinkuin
ihmiset olisivat varautuneet ja ne todella
niinkuin sitten itse olisi aineksia millä käsitellä
ja mistä tehtävästä on kysymys.
H: Aivan.
O: Että ei tule semmoinen kilpailutilanne että
ainut minä olen oikeassa ja ?? on väärräs että
vaan on kysymys itä, että ihmiset on erilaisia
ja ei ole huonompaa ja parempaa tapaa toimia
vaan on erilaisia tapoja toimia. Se ei tarpeeksi
selvästi meille kyllä silloin alussa niinkuin ??
H: Että tavallaan se teoreettinen selvittely on
tärkeää.
O: On ja heti ?? viimeistään siinä vaiheessa
kun alkaa sitten ?? se me niinkuin kaikki
koettikin?? mutta se tuli siinä esille.

MU6 H Olisiko simulla siihen ensimmäiseen
sitten siihen seminaaritilanteeseen liittyen. Että
miten siinä koit esimerkiksi sen, että kun
kuitenkin tarkoitus on että siinä opitaa ja
siinä jää semmoinen positiivinen mieli kun
läheet siitä. Oliko se siinä mielestä semmoinen
ja?
O: Kyllä se minun mielettä oli. Silloin minä en
vielä osannut ajatella että sitä mitä niinkuin
hyötyä tästä on koska se oli niinkuin uusi
tavallaan koko juttu mutta tämän toisen jälkeen
sitten sitä rupeisi niittimään että miten tätä
voisi käyttää. Ja sitten minulla tuli niinkuin
sekin, että tuolla terveydenhuolto-
oppilaitoksella opiskelijat on käytännön
harjoittelussa, niin sehan on erinomainen tapa
just tämä että opiskelijat kertois negatiivisen
ja positiivisen ja sitten tällä tavalla tuoda niitä
ilmi ja käsitellään. Sitä voi niinkuin yhtenä
tapana käyttää siihen purkamiseen. Että silä
lailla.
H: Että oivallsit sen.
O: Niin, että se, että tämä on niinkuin tavallaan
itsele nyt täällä yksi tapa niinkuin oppia ja
sitten tietysti siinä teet siitä omaa väitöskirjaasi
ja sitten tuota niinkuin mietit että mitä niinkuin
jatkossa tästä olis hyötyä. Niin se sitten
niinkuin tuli mieleen että ilman

TMU6 O oivallis toisen merkityksellisten
ekemus teknisemminaarina jälkeen,
etta menetelmä sopisi hyvin hoitotyön
opiskelijoiden käytännön harjoittelun
kemusten reflektointiin. Hän aikoo
käyttää merkityksellisten kemusten
analyysimenetelmiä tulevassa opettajien
työssään
muuta haluan kokeilla tätä. H: Hiin se yksi tarkoitus onkin.
O: Niin. H: Just se että nämä menetelmät mitä käytetään niinkuin täällä kulutusohjelman sisällä niin ne ois sitten myös päähän just kun valmistuu että niitä voisi itse sitten käyttää.

MU7 Miten sinä koir, jos mennään vielä sitä päivää vähän niinkuin tarkemmin että just nämä tilanteet, että kun tullaan siihen koko ryhmään ja muodostetaan ne ryhmät, muistatko sen? Mehan on niinkuin molemmilla kerroilla tehty niin, että on vaan niinkuin sanottu että jakaantuuka vaikka nälään ja sitten sotkettu että ei toimita tämäomaisissa tavanomaisissa ryhmissä?
O: Minä en oikein muista, että miten ne tuli ne ryhmät? Molemmilla kerroilla niissä oli semmoisia ihmisiä jotain kanssa yleensä ei. Mutta ?? minä ainakin koin molemmat ryhmät ihan sen ajan kun niitä ryhmätöitä tehtiin, niin ihan hyvänä että siinä oli niinkuin se eka kertakin, niin siinähän oli aika paljon, olkohan siinä kahdeksan vai mitä siinä ryhmissä niin sitten oli hirveän hyvää, että niinkuin jokainen sai, aika tasapuolinen olisi se, että sekin että se piti nostaa teorian tasolle, niin minulla on semmoinen työskentelytapaa, että pitää hirveästi ideoidaan ja ? tallal lailla ja pitkään olla ja ne ei tahtomuk löytyy ja sitten minä sanoin että ei vielä kirjoiteta että vielä jutellaan vähän, niin sitten se tuli se. ??roolisijauista kysymys. Etta siinä mielellä niinkuin ei tyytä heti että nyt kude ruvettaa kirjoittamaan ja laitetaan paperille ja se on tässä vaan sitten että niinkuin oli tilaisuus siihen. ?? kannioitettiin sitten

MU8 H: Joo. Siinähän oli varattu molemmilla kerroilla aika pitkä aika siihen ryhmäommaan. Muistako sitä että olko se sinusta hyvä vai olko se aika sopiva tai jääkö siinä jo sitten luppoaikaa?
O: Etta siinä eka kerrallahan vähän sanottui että voisi niinkuin mennä kirjastoonkin etsimään mutta ei siihen

TMU7 O:n opiskelu pienryhmässä, joka oli muodostettu anayysseminaaria varten oli mielekästä. Hän koki, että vertaiset kunnioittivat hänen toiveitaan ryhmässä työskentelystä.

TMU8 O arvoi ryhmätyöskentelyyn varattun ajan riittäväksi kokemuksen analyysia varten, muttei riittäväksi hakea uutta tietoa kyseisessä tilanteessa.
jostakin psykologian oppikirja tai sitten tietysti jotaan sisällysluetteloi ja palautua mieleen. En muista, että jääkö siinä, en minä usko, että siinä jää. Eiköhän siinä kävy syömässä tai kahvilla tai jotaan. ?? vaikka alusas tuntui, että niin kauan aikaa. En minä ainakaan muista jälkikäteen en muista sitä että olisi ollut liian kauan se aika.

**MU9 H:** Mites sitten ihan sitten tämä homma sitten että tuota, kun siinä toisistaan ideana se että lähettäisi sitä kokemusta miettimään ja niitä olettamuksia mitkä sen taustaululla on ollut, niin ja sitten yksi tärkeä asia on tämä että ei jääisi ihan siheen sen kokemuksen tasolle vaan toistaan niinkuin teoreettisota siitä myös. Onko se ollut siinä mielestä semmoista ja onko siheen tulleet tarpeeksi selkät ohjeet ja? Mikä on sitten vielä siinä mielestä ohjaajan panos just siinä, tässä hommassa?

**O:** No eihän siinä oikeastaan selkeämpi ohjeita voi antaa. Kyllä se ainakin molemmassa ryhmissä missä olin niin tuota minun mielestä se niinkuin eten siitä tapauksesta siihen käsittelyllä tasolle kuitenkin ???.?? Että sitten mieti niinkuin laajemmin ja sitten niinkuin pitkäaika valitsehtoja ja sitten niinkuin niiden syitä ja kaikkia tämmöisiä. Ainakin minä koen niin, että se nousi näissä keskusteluissa. Että tässäkin viimeisessä kun on operustapaukustani ?? ja mitä se oli sitten oppinut ja niin kyllähän sitä sitten rupesi niinkuin miettimään että millainen, että millä tasolla se ihminen on nyt siinä opettajaksi kasvussaan. Ja sitten että kun hän nyt on kokenut sillä tavalla että mikä merkitys sillä nyt sitten on ja kaikkea tämäsi. Ainakin ne ryhmät missä olin ????????????????

**TMU9** O koki tutorin ohjauksen kokemuksen analyysin selkeäksi ja kokemuksen analyysin eten verstaisten kanssa yhteisenä pohdintana teoreettiselle tasolle opettajaksi kasvuun kannalta.
MU10 H: Joo. Miten siiä koet sen, että meillä on tällä tavalla toteutettu, että toisiaan ne tilanteet tai ne kokemukset tuodaan siihen tilanteeseen nimettömänä? Vähän alussa sanotkin jotakin siihen liittyvää että siinähän on sitten osa on toisiaan niitä myönteisiä kokemuksia ja osa on kielteisiä. Muistatko siinä että minkälaisia, olko siinulla kielteinen vai myönteinen kokemus? O,?? tokassa.???
H: ?? Tarkoitan sitä seminaaritilannetta.
O: Ai niin! Tämä toka oli myönteinen ja eka oli sitten kielteinen kokemus.
H: Joo. Onko siinällä siihen liittyen jotakin?
O: No ei molemmat on ?? ei se se haittaa kumpi se on. Etä siinähän kuitenkin se asia niinkuin kyy ilmi tai siitä voi niinkuin keskustella monella tapaa. Ei sillä ole merkitystä minun mielestä. Tietysti sille ihmiselle on merkityksellistä se, että, no ehkä sitten ryhmälekin on että joku negatiivinen juttu käsitellään ja se tavallaan sitten niin käsitellään että se niinkuin käsitteellistetään ja se selkeen paremmin. Positiivinen nyt on sitten ehkä ?? ei siinä tarvitsekaan olla sitä semmoista että se on jo positivinen kokemus mutta se negatiivinen saataisi niinkuin positiivisemmaksi ja tai oppitavaisesti niin

MU11 H: Tulisiko siinällä sitten muuta just nähin seminaaritilanteisiin liittyen?
O: Niin en tiedä, tässähän nyt oikeastaan tulikin että... että kyllä siinä minusta riittävästi oli aikaakin minusta keskustella ja sitten jos ajattelee että isä käyttäytäisi tätä menetelmää niin sitten pitää olla se ilmapiiri semmoisen, että ihmiset todella ?? kyllä minun mielestä se oli se ilmapiiri?? tämä meidän ryhmä onkin semmoisen että se aikoo hyvin uskalla sanoa kyllä monenlaista mielipiteitä esille ja rohkeasti ??? että se sitten palvelee sitä asioa ??, ???? ja sitten eri tavalla niinkuin tässä toisessakin tilanteessa jokin esittävät sen tämänä draamaan. Ja tuota tavallaan siinä tuli niinkuin tästä paperista kun luin nyt tämän näin niin erilaisiakin

TMU10 O arvioi sekä myönteisen että kielteisen kokemuksen analyysin on oppimisprosessissa samankaltainen, mutta merkitykseltään kielteisen kokemuksen analyysi on erilainen. Kielteisen kokemuksen analyysissä kokemus jäsentyy ja muuttuu oppimista edistäväksi.

TMU11 O koki ilmapiirin myönteisenä oppimistilanteessa ja kokee opiskelijaryhmän myönteisenä ja erilaisia nälkemyksiä rohkeasti esille tuovaksi. O olettii, että yksi kuvatuista kielteisistä kokemuksista oli tilanne, jossa myös hän oli ollut mukana ja jonka hän oli kokenut myönteisenä. Siksi hän yllättää, että joku kolemasta tilanteeseen osallistujiasta oli oletettavasti tilanteen kielteisenä. O varmistui vasta haastattelussa, ettei kyseessä ollut ollut hänen ja vertaisten tilanteen kuvaus.
asioita. Tavallaanhan tässä puhutaan positiivisesti ?? negatiivisakin että siinä halutuin niinkuin valloitaa koko sitä asiaa muualtaakin puolelta kuin mitä tuli esille ihan sitten tässä sikäli henkilökohtainen juttu että minä ensin oletin, että nyt se on siitä meidän tilimm?? että varmaan siitä sitten tuosta negatiivisista juttuja tulee että onkohan ne tytöt kokenut sen sitten niin. Mutta sitten kun minä ?? niin ehän se ollutkaan että siinä oli joku muu, koska siinä oli kaksi henkilöä ollut pitämässä ?? että tänä on pelkästään positiivinen, että minullehan tuli semmoinen puolustuskanta sitten siinä, että minä rupesin vähän sanomaan että tai kertomaan siitä omasta että ne, niillähan oli, en minä ainakaan kokenut niin.
H: Yhdistit tavallaan siiten omaan.
O: Niin tuli semmoinen että hyvä ihme, että onkohan ne kokenut todella niin, me kyllä koettiin kaikki kolme että se oli positiivinen kuitenkin. Vaikka mulla oli pitkä työkokemus ja sitten kahdella ei ollut ollenkaan että siinä vaan pitä niinkuin tullut vast?? että ollaan niinkuin tilinn. Että siinä mielessä minä muistan sen ihan sen niinkuin tietysti kun se silloin niinkuin nostatti karvat pystyyn.
H: Selvisikö sinulle jo siinä sen seminaaripäivän aikana?
O: Ei.
H: Nytkö se vasta selvisi?
O: No nyt vasta selvisi, kun minä luin tämän niin minä olinyllättynyt että ai että eihän tämä olekaan että tuota jotakin minulle jää semmoinen kuva, että nyt on varmasti meidän jutusta kysymys. Tai sitten tämä ihminen on sitä vähän muuttanut, en tiedä.
H: Tuota kyllä se semmoinen on ihan siinä mitä se on ??
O: Joo mutta minä tarkoitan, että sillä lailla muuttaa että ei tunnisteta tai en tiedä, positiivinen kokemus.
MU12 H: Miten sinä nyt sitten ajattelet että kun tämä nyt vastaa kävi ilmi tämä asia, että se ei ole?
O: No minua helpottaa, että minä niinkuin koskaan sitten sitä kysynyt ?? enhän minä tiennytt että kenen sen on, kuitenkin oletin että ahaa se varmaan sitten toisa, että ihan
H: Mutta ajatteleenko niin, että sen pitäis jotenkin koko ryhmän esimerkiksi nähän ne tapaukset sitten muullakin tavalla esitetynä tai esimerkiksi esitetynä. Voiko miettiä, että olisiko se sinun tilanne ollut erilainen jos sinä olisit tiennytt sen että?
O: Niin no varmasti jos minä olisi niinkuin tiennytt ettei se nyt varmaan ollut minun, siitä meidän jutusta kysynnys, minun ei olisi tarvinnut puolustautua sinä. Mutta niinkuin tussa kesällä känvin yhden kurssin kavestiä ja ihmissuhteet niin siellä oli sosiodramaamasta sitten mitä sinä jutelin ??? niin siellähan oli samantapainen tavallinen että niitä tapauksia on koettu ja siinä ryhmän keskenään miettiin mikä niistä otetaan mikä on meille merkityksellisin ja opettavaisin, niin voisihan tänkin ajatella niin. Tietysti niitä on niin paljon että niinkuin jos ajattelee, että joku ryhmä saa vaikka nelja paperia ja mietti sitten, että minkä ottaa. En tiedä onko sillä sitten.
H: Tai sitten ehkä se, että onhan tästä erilaisia versoita tätä metodin käytöstä että siinä tilanteessa sitten ihmiset lähëe mietittämään, että mikä se olisi se myönteisin kokemus siellä opetusharjoituksessa ja niinkuin siinä kerrotaan sitten pienessä ryhmässä toiselle. Tuu mitä sanoit, niin senhän voisit niinkuin sillä tavalla ja sitten vaikka kaikki kertoisit ja siten mietittäisi että mikä niistä otetaan.
O: Ehkä se näin kirjoitettuna tulee aidompi tai semmoinen niinkuin, en tiedä. Sitä voisi kokeilla erilaisia.

TMU12 O tunsii haastattelutilanteessa vapautuneensa, kun hän havaitsi, ettei kyseessä ollut hänen ja vertaisten kokema tilanne. O arvioi, että hän olisi ollut vapautuneempi merkityksellisten kokemusten analyysiseminaarissa, jos hän ei olisi oletanut virheellisesti yhden analysoitavan tapauksen olleen kuvaus, jossa hän oli ollut kahden vertaisen kanssa. O arvioi, että merkityksellisten kokemusten analyysiseminaaria on tarkoituksenmukaista toteuttaa eri tavoin esimerkiksi siten, että ryhmässä kuvataan kokemuksia ja niistä valitaan osa tarkemman analyysin kohteeksi. Kuitenkin O arvioi, että etukäteen kirjallisesti kuvattu kokemus on kokemusta konkreettisemmin kuvaava kuin se olisi tilanteessa kuvattuna.
MU13 H: Vaikuttaisiko se tilanne jotenkin että siinä eits itten kertoisi?
O: No ehkä. Ja sitten ei välttämättä niin pitkään siinä analyysissä sitä että no minkä minä ottan, että siinä voisi ollakin että siinä niinkuin karsii pois semmoisia mitä ehkä niinkuin siellä yksin miettessä laitettakin. ?? mutta niitähän voisi kokeilla erilaisia tapoja.
H: Kyllä.
O: Periaateena kuitenkin ??muistaa niinkuin tuollakin eri oppilaatoston ?? ryhmän kanssa oli tekemisessä niin ??sen opettajan kanssa keskustelin niin ne muoret ei niitä tunteita pysty käsitteleämään ja ne on niinkuin, ryhmä kun se aloittaa kun on peruskoulun käynyt ja tulee niin menee pitkä aika että he eivät niinkuin keskenäänkaan pysty sitä tuomaan niitä henkilökohtaisia. Hyvin tarkkaan niinkuin, ainakin se ryhmän niin oli mennyt, itseasiassa kolme vuotta ennenkään ne pysty joku poikkeamaan ryhmästä taikka sanomaan jotakin henkilökohtaisia niin tällä se alkaisi aika pian esimerkiksi tämän olla tavalla niin se voisi helpottaa siinä. Että sitten niinkuin opittaisi käsittelemään niitä tunteita ja miettimään niitten kokemusten ja tunteita oht tavallahin??
H: Koska se on kuitenkin sitten jos ajatellaan että hoitoytäte tehdään aika tärkeä koska pysty monella kanavalla itse sitten toimimaan ja sitten vastaanottamaan poitilaat ja asiakkaatkin.
O: Niin ja toisiaankin, omia tunteita käsittelemän.
H: Joo.
O: Ja niitähän miettimään sitten että oppii tuntemaan itseakin siinä.
H: Joo. Kyllä monet asiat mitä muoret tai ihmiset jotka on koulutuksessa jotka ei ole alalla ennen olut, niin kyllä varmasti tunteita liikkuvia asioita mitä siellä kohdetaan niin.
O: ?? itse muistaa niin niitä on pakko käsitellä ja aika perusteellisesti? ?? ei jäisi painamaan ?
H: Koska se vois olla taas sen uuden oppimisen esteenä. O niin.
H: Jos reflektivistä oppimista ajatellaan niin joku tämäminen negatiivinen kokemus ahdistaan niin se on tavallaan este sille oppimiselle.
O: Niin ja sitten kun siinä tulee kun ryhmä käsittelee ?? yhdessä niin saattaa olla samanlaisia kokemuksia, niin sekin sitten niinkuin sitten huomaat että ei ole yksin joka ??? ja sitten yleensä??

MU14: Tulisiko vielä mieleen nyt sitten ihan koko joko niihin seminaareihin tai?
O: Niin. Kyllähän se silleen niinkuin että niitä esittämisätkin mietti miten ??? löytyyhan sitten siinä se, että aika luovalla tavallahan sitä sitten, ainakin jokut, esitti, että ihan hyvää, toteuttaa sitten niitä erilaisia ilmastoja, että se ei ole pelkästään semmoista asiallista keskustelua vaan se voi olla myöskin tämäntästä muilla tavalla herättää ?? aivan jännä joku draama tai joku. Sitä vois ehkä korostaakin, että voi niinkuin esittää muillakin tavoilla.
H: Joo.
O: ?? ehkä niinkuin paremminkin jakaa.
H: Niin se on aika hauskaa ainakin minusta se oli ihan todella hauska se just tämä yhteisopettaminen ?
O: Niin konkreettisesti tuli kyllä.
H: Kyllä.
O: Karrkoiden esille.
H: Niin joo.
O: Sitten meilläkin oli siinä eka jutussa se pantomiini?? selkeä, sitten että se oli pitänyt sitten ehkä hioa vielä, harjoitella ehkä kerran.
H: Oliko teillä se siinä x:n luokse tai jonnekin haastatteleana meni?
O: Niin se oli joku x:n juttu. Oliko ?? vai kenenkä luokse se opiskelija meni haastattelemaan ja ?? tulossa tekemään sopimuksia.
H: Olisiko vielä muita ajatuksia?
O: Niin en tiedä miten ne ihmiset kokee joitain tapaus sitten.
H: Onko sinullla? Oletko keskustellut opiskelijakavereitensä kanssa?
O: Ei en. ?? siinä tilanteessakin tietyistä kun olettaa jonkun ?? mutta tietää että mitenkä ne sitten ajattelee. Että sekin, että onko se niinkuin tulkittu oikein se tilanne ja sitten. Tietyistä naisahän kertomuksissahan niinkuin, sekin eka kerralla mikä oli niin sehan jätäni tavallana että ?? olikin sitten mahdollisuus jakaa sitä ?? ei se ihminen niinkuin sitä muista, kunsi niinä kertomuksessa sitten niinkuin sitä analysoinut, jos muistan oikein. Semmoinen aika lyhyt ja ytimekäs juttu että en tiedä oppiko hän sitten sitä vai kokiko hän niinkuin negatiivisena sen että sitä käsittelii. Kuitenkin sitä sitten joudutaan pikkuisten menemään siten persoonaan vaikka sitä kyllä valitetaan siinä keskusteluussa varmaan koko ajan että niinkuin että ei siten sanottaisi mitään. Mutta kyllähan siinä kuitenkin tulee että miksi hän toimi niin ja

**KASETIN PUOLEN VAIHTO**

H: Niitä henkilöitä joitaten tapaukset on ollut siellä ??

**MU15 H:** Niin kyllä. Sitten lisäksi on arvottu muista.

O: Sehän on hyvä. ?? kokee niitä positiivisena tai negatiivisena?

H: Minä en ole sillä tavalla oikein. En pysty sanomaan kun en ole kunnon analyticsa tehnyt sitä että. Kyllä siitään tietyistä nään voi sanoa että tämän onen omat momenttinsa siinä on kun se on se oma tapaus.

O: Mutta onko siinä sitten? Te valitsitte esimerkiksi tapaukset niin katsoitteko te kuitenkin että se ei ole liian henkilökohtainen? Vai miten te valitsitte sen?

H: Joo. Tässähan jos muistat, niin oli se että jokainen voi niinkuin laittaa sen merkinnän että toivoo, että kun tässä on niinkuin ideana on se, että kuitenkin kaikki miettisi, että mikä se on se merkityksellinen.

O: Niin.

H: Mutta jos se on niinkuin sen tyypinä että itse arvioin, että en halua että sitä

**TMU15** Huolimatta siitä, että opiskelijat voivat etukäteen plättää antavatko he luvan oman tapauksensa käsittelyyn seminaarissa, seminaaritilanne on yksilölle yllättävä tapauksen julkinen käsittely vuoksi.
käsitellään julkisesti niin senhän voi jo sitten laittaa sen että en halua.
O: Joo.
H: Ja osa käyttääkin tätä. Aika monetkin on laittanut sitten ????että ei julkisesti käsitellään. Mutta sinänsä siitä huolimatta varmaan että vaikka sen niinkuin harkitsee sen kotona, niin se tilanne on sitten tällä seminaareissa erityyppinen.
O: Niin. Itsekkihän sinä oletkin siinä paljaana kaikkien.

**MU16**

H: Ja sitten ehkä sitä minä olen aika paljon miettinyt just että onko se tämästä, just tämä nimettömyys, toisaalta että niinkuin sen merkitystä, että.
O: Eihan näistä niinkuin esimerkiksi saa selville, välttämättä kaikista, ne on hyvin yleisellä tasolla. Mutta sitten jotkut hyvin persoanalliset ja heidän tapansa puhua, niin se näkyy myöskin siinä tekstissä.
H: Joo. Lähinnä minä olen sitä nimettömyystä siinä mielessä mietinyt että onko se niinkuin turhaa. Että jos voisikin olla ihan avointa pelia että.
V: Niin se voisi olla. Mitä sitten. Niin en tiedä. Niinkuin tässäkin ???kokemus minä ilmeisesti laitoin, niin hilveäsi ?? ??? voi kamala minä en laittanut sitä että ei saa käsitellä että jos se tuleekin niin siinähän että siinä voi tulla aika minä ajattelin että et siinä sitä ota kun se on noin pitkä
H: Kun toisaaltahan tässä on se, että halutaan semmoista kutenkin joka todella on merkityksellistä koska tässä on idea
V: Koko ryhmälle
H: Niin. Ei kun siis halutaan, että ihmiset kerto toisaan niitä asioita jotka itselle on merkityksellisiä ollut koska tässä on ideana just tehdä siitä myös tämän asian sisällölistä kehittämistä. Että silloin, jos se nousisi korkealle se kynnys kirjoittaa niitä asioita, niin tuota silloin se ei niinkuin päätäksi kovin syvälle siinä kehittämisessäkin koska ne olisivat aika pinnallisia asioita mitä ihmiset kirjoittaisi.
MU17 O: Niinkuin tässähän oli tämä toinen tapaus, niin sehän oli ensikin kun saatiin tämä niin tuntui, ettei tästä saa mitään irti että tämähan on niin yleinen ja tämoinen ja tämä on niin semmoinen pelkistetty mutta sitten kun rupeisi sitä käsittelemään, niin sieltä rivien välistä tavallaan nousi ne tunneutut ja tuosta kokonaisuudesta että ei sillä toisiaan sillä. Ja sitten kun ajatteli että tästä on niinkuin pakko saada nyt irti se asia, niin sekin oli jännä että se kuitenkin tulee siellä.
H: Joo. Niin tuosta vielä, että mitenkä me valitaan nämä, niin sillä tavalla että meillähän on tietyt tavoitteet näitten opintojakojen suhteen. Että me katsotaan vähän suhteessa niihin että olisi sen tyypistä kuvauksia ja sitten joka tavoitteen suunnassa tulisi yksi kertomus.
O: Joo kyllä se ihan hyvä. ????????????????? Että ihan hyvä että meidän koulutuksessa on tämäkin. Että eihän tätä niinkuin varmaan tulisi käytettyä eilet olisi itse kokemut sitä. Sitä ei ehkä huomaiskaan että tämoinenkin on olemassa.

TMU17 O huomasi, että pienryhmän saatua tapauksen analysoitavaksi aluksi vaikuttii siltä, ettei lyhytä kuvauksesta ole mahdollista analysoida yksityiskohtaisesti. Vertaisten kanssa yhteinen prosessointi kuitenkin toi uusia näkökulmia tilanteeseen. O on tyytyväinen, että hän on oppinut kyseisen menetelmän käytön opettajakoulutuksessa omakohtaisen kokemuksen kautta ja olettaa käyttävänsä mentelmää tulevassa opettajan työssään.
PHASE 4: Specific description of situated structure
Synthesis of the transformed meaning units into a consistent statement

ha4oh25
MU1-MU17

kirjallinen kuvaus ja pohdinta
tartoituksenmukainen ja mielekkästä,
kuvata, reflektoida ja selittää teorialla
kokemusta etukäteen
MU1, MU2, MU12

häiritse
ryhmäprosessien esille tulo,
opiskelu ollut liian itseohjautuvaa
yhteistoiminnallisissa vertaisryhmissä
ohjaajan tukea tarvitaan
MU5

kielteinen kokemus
prosessoituu, oppiminen
edistyy
MU10

sopii hoitotyön koulutukseen,
aikoo käyttää opettajantyössä
nuorten koulutuksessa:
tunteiden käsittely
MU6, MU13

turvallinen
oppimisilma, oppi
Mu7, Mu11, Mu14

yllättävä tilanne, huolimatta,
että on antanut luvan
MU15

tapauksen nimettömyys:
virheellinen käsitys tapauksesta
MU12, MU16
PHASE 5: General structural descriptions
Synthesis of all the participants’ specific descriptions of situated structures

R TYPE I, second practicum: THE PUBLIC ANALYSIS OF ONE’S OWN CRITICAL INCIDENT CAUSES STRESS

The individually written description of critical incidents and reflection upon it is meaningful preparation for joint analysis. In a collaborative group recognizing that one of the critical incidents for joint public analysis is one’s own causes stress and possibly withdrawal from discussion in order to keep revealed that the critical incident is one’s own. The anonymous analysis of critical incidents in collaborative analysis is not meaningful.

In collaborative analysis noticing the similar experiences of peers fosters learning, as does the analysis of the negative critical learning incident. The analysis of critical incidents is disturbed by simultaneous problems in collaborative learning. The critical incident method is useful in health care education and teaching of nurse students.

(ha1, ha4, ha6 The specific description of a situated structure of three Finnish nurse student teachers’ was included in this type of general structural description).
Example of data analysis of a British nurse student teacher’s interview data concerning the experiences of participating in the reflection seminar in which critical learning incidents were analyzed collaboratively.

PHASE 2: Discriminated meaning units
Dividing the data into the meaning units (MU)

MU1 The critical incidence that I chose to discuss, first of all the positive incident was my initial meeting with my mentor and I describe this as a very positive experience for myself because I’ve never had a mentor before really within a clinical placement area. I think that the relationship that I had with the mentor was particularly good because I’ve worked with her before so we knew each other, but certainly not on the basis of mentor and mentee.

MU2 She had actually planned in advance for me commencing the secondment and that was extremely helpful because I felt as if I was going into a planned framework, and the type of person that I am, I need to know where I’m going to be and what I’m going to be doing, so I found that very useful indeed.

MU3 We met up prior to the secondment taking place and were able to discuss through certain issues that I wanted to develop during the secondment so I felt as if I had some control over the secondment and wasn’t just being directed, so its very much a shared experience. And it was interesting that the actual mentor had some concerns about mentoring myself, so we were able to discuss those through before the secondment actually started.

PHASE 3: Transformed meaning units (TMU)
Search for essences of the meaning units and transformation into the language of the discipline (nursing didactics)

TMU 1 S described a positive experience of S’s studies at clinical practice where S had first time mentor, with whom S happened to be familiar earlier from their joint professional background. The relationship as a mentor and mentee between them was new.

TMU 2 The mentor had planned by herself the topics for the initial phase of S’s practice and S was satisfied that she had schedule which made the studies objective-oriented.

TMU 3 S met the mentor before the teaching practice officially started at which meeting they had a dialogue where they both described their own views of the schedule and issues related to the role of mentor.

* phase 1 sense of the whole experience: raw data is presented in the phase 2 already divided into the meaning units
MU4 I really appreciated the fact that the first day was taken up with socialisation to the new environment because although I’m very happy and confident in my work environment, if you take me out of that then I can be quite anxious, so I felt as if that was sorted out before I actually prepared the secondment properly - before I started properly.

MU5 And we had dedicated time to meet up every week, so it meant that we could discuss through how our relationship was going and also look at the issues arising from the secondment and potential problems for the next secondment that’s coming up in a few weeks time. So I feel as if I’m prepared for the second secondment as well as .. for the first.

MU6 The negative incident was a little bit more difficult for me to find because there was very little that I felt was negative out of the whole secondment .. But the one that I had the most anxiety about, or the incident that had the most, gave me most anxiety, was actually going into a different clinical area and that’s probably because my background is very much neurosciences for about the last twenty odd years and now, all of a sudden, I was going to go into a different clinical area in a different hospital and I felt very much the novice going in, which was quite strange to me. However my mentor went with me and guided me through that and I was very pleased that she was there. I felt absolutely .. strange going into .. into another clinical area and talking to different nurses who I now perceived it as them being the experts and me knowing absolutely nothing about it.

MU7 But interestingly, once I realised what they wanted from me, and the fact that I could probably meet their needs, that gave me quite a good feeling. My main concern now is that if I don’t give them expert teaching, then I may let them down.

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TMU 4 S experienced it pleasant that the initial phase of the teaching practice was reserved to become familiar with the social learning environment because S felt herself insecure in a new environment whereas in a familiar environment S feel herself secure.

TMU 5 S and the mentor made an agreement of regular meetings during the teaching practice. The aim of the meetings was to evaluate the mentor relationship, the issues that S had experienced significant during the practice and to plan the next teaching practice period.

TMU 6 For S it was an unpleasant experience to expect the teaching practice in clinical area that S had no professional expertise, although S had a long experience in a different field of nursing. S got support from the mentor while they entered to that clinical area.

TMU 7 S got her self-confidence back while S understood that S’s abilities to teach and that unit nurses’ learning needs are in balance. However, S is worried about the quality of teaching S can
and consequently let you know, the neuroscience unit down as well I suppose.

**MU8** It gave me a much better understanding as to why teachers find it very difficult to bridge the gap between clinical areas and the university area because both areas are seen as expert areas and trying to actually get between the two must be very difficult.

**MU9** I must admit that if I’m teaching within my own clinical area I don’t feel like that at all. I feel very confident and I enjoy the teaching there and I think the next secondment that I have, it’ll be a real challenge to me to see whether I can enjoy teaching in an entirely separate clinical area such as intensive care or liver transplant areas. And hopefully that will bring something back into my own practice that I can take back into neurosciences with me. So there may be another critical incident coming out of that.

**MU10** My main reasons for choice for these two critical incidences are as follows. First of all, I thoroughly enjoyed being mentored so I felt that that was a very good, positive area from the whole of the secondment and I did think it was worth taking myself through why I had found that to be positive. The second incident as I said earlier on the tape, I found it very difficult to find a negative incident because the whole experience had been positive, but this was the one that I was most anxious about and I felt it would be useful to actually write it down and have a look and see if I could find out why I was anxious about it.

**MU11** What I’ve learned from actually writing down the incidents was first of all, that due to good mentorship, I was able to see the theories of mentorship put into place - that if it was planned in advance and then if you were able to revisit the mentorship experience throughout the secondment, you do in order to response to the nurses’ expectations and to be a high quality representative of the unit S comes from.

**TMU7** Through that experience S started to understand teachers’ problems to integrate the expertises of academic and clinical areas because they both areas are so specialized.

**TMU9** When S teaches the topics related to S expertise S doesn’t feel unsure. S is unsure weather S will enjoy of teaching very specialized area of nursing without own expertise of that field during the next teaching practice. S expects that that may be a negative experience, however S wishes that S learns of that and could use it later on S’s own professional practice.

**TMU10** S choose the particular incidents both positive and negative for analysis because S wanted to concentrate to analyze why the events were critical.

**TMU11** S assessed that by writing down the incidents S also could analyse and understand them from theoretical perspectives.
could actually gain and build on that all the time.

MU12 It also was good from my point of view that I was able to build up the relationship with the mentor and that will help me back in my clinical area, it will be a continuous process, and it won’t just be restricted to the secondments. It also meant that it was very useful for my assignment because we were able to talk about the assignment and I was able to get some .. well both positive and negative reinforcement from my mentor in order to make sure that I was going in the right direction with that, which helped relieve anxiety about producing an assignment whilst I was actually doing the secondment.

MU13 The second incident, the negative incident, what I’ve learned from that is that I’m basically an anxious person and I like things, I like to be well prepared before I go into.. an area that I’m unsure about. . The one good thing about having looked at the incident and having written about it is that I now feel that as long as I do prepare and I have the background knowledge for what I’m going to be teaching in the clinical areas, it should go all right.

MU14 And the one thing that I have learned through discussion of the incident .. with my mentor was that at least students don’t know when you’re anxious, there’s only you that knows about it, there’s only if you actually have a horrendous experience that they do realise what’s happening.

MU15 The good thing as well when I actually wrote through the negative incident was, that I was able to remember how welcoming the people had been in the clinical area, that they were pleased to see me and that they were pleased that there was somebody going to be coming in to actually help them with problems that they had identified from a clinical base. And they also recognised that I did have some expert

TMU12 S was satisfied about the rapport with the mentor, who gave critical feedback to S in line with the goals of the course. That decreased S’s stress during the teaching practice period.

TMU13 By writing down and analysing the negative critical incident S became aware of S’s personal features as a teacher and S’s views of being well prepared before teaching emphasized.

TMU14 The discussion with mentor got S to understand that students do not recognize S anxiety; it is only S’s internal feeling.

TMU15 While writing down the critical incidents S became aware the supportive atmosphere in the clinical learning environment and nurses motivation to participate in a session where somebody (S) could help them to analyse and solve their clinical problems and help them to develop the quality of nursing practice.
knowledge in the areas that they wanted to explore. So that will be useful for the future secondment.

**MU16** This next part of the tape is about the discussion with the other two members of my group. I’d have to say right at the very beginning that it didn’t feel threatening at all because I know the group members very well - we’ve already worked together for a year, and I felt quite happy about sharing both good experiences and bad experiences with them. It didn’t feel threatening at all... I also knew the tutor particularly well so I was quite happy about the tutor knowing what had gone well and what had gone wrong within the secondment, although I wouldn’t say that any of the experiences were experiences that had gone wrong.

**MU17** It was quite interesting listening to people’s other experiences and realizing that sometimes they were very similar to your own. And it was nice that all three of us were in the position of actually being... being able to give positive feedback and to diffuse the anxieties that other people had felt, and I felt quite good that they were able to help me. So I didn’t have a problem with the actual sharing of the critical incident.

**MU18** The feedback was good because you were able to listen to other people’s experiences and then think about how you would feel in a similar situation and maybe bring some sort of coping... yeah coping mechanisms to help your colleagues and it’s always nice to be thought of in a helping role.

**MU19** Generally, while my colleagues were giving me feedback from my critical incidents, I felt well supported by them. They certainly weren’t critical of the incidents themselves and they weren’t critical of me as a person... I think I knew when I started off talking about the critical

**TMU16** S experienced the group session pleasant because all the participants, peers and tutor, knew each other from earlier. S was motivated to describe S’s critical incidents so that the tutor got information of S’s experiences.

**TMU17** S was motivated to get to know peers’ critical incidents and became aware that some of them were like S’s incidents. S was satisfied that the group discussion was an opportunity to share and analyze experiences and give and get feedback, which confirmed the positive learning experience and relaxed from the experience of negative critical incident. S got support from peers and it was pleasant to analyze the critical incidents with peers.

**TMU18** S learned from peers’ experiences by trying to imagine S’s own action in similar situation and trying to develop a strategy how to manage in similar situation. S felt that positively because S could benefit peers.

**TMU19** The peers analyzed S’s critical incidents very objectively and they didn’t assess S’s personal features but that was what S also expected.
incidents that I would get support from them, but it’s always nice to have that reinforced.

MU20  There’s certainly a couple of comments I can remember about .. the incident when I was talking about going into the ward areas and feeling quite anxious about it, that they reinforced my own perception which was that I was a very anxious person and I like to get things right and I like things to be planned. So it was nice that I’d, I felt that I’d actually written that down and that my real feelings had come through about it. So it was nice to get that reinforced by the group themselves. And it was useful for me to remember that afterwards.

MU21  Perceptions of the colleagues of my incidents - it was interesting that as an overview of all three of us when we were talking about it, there were similar concerns come out from all of the incidents. So it was nice to know that other people have similar problems when facing similar type of incidents.

MU22  My feelings about taking part in this type of learning from shared critical incidents are mixed really. First of all, I think that the environment that you disclose your incidents in has got to be very safe and you’ve got to feel quite secure with the people that you are disclosing with. And as I’ve said earlier, this isn’t, that wasn’t really a problem for the group that I’m part of because we know each other very well. But that’s taken a year to develop. I don’t think I would have been so happy about sharing them with the group had you asked me to do this a year ago.

MU23  I think there is value to sharing critical incidents and I think in nursing we’ve always done this in a very informal way, possibly over a cup of coffee, the ‘coffee-break syndrome’ or the ‘lunch-break syndrome’.

TMU 20  S was satisfied that S’s real experience of being an anxious person in a certain situation could be discussed with peers because S had written it down while S described the incident.

TMU 21  S experienced positively when S noticed that also peers’ had similar problematic issues.

TMU 22  S is unsure of the use of critical incidents as a learning method because the learning environment has to be absolute safe while students can reflect on their real experiences. While S reflected with S’s peers on the critical incidents S felt the learning environment safe, because the all knew each other.

S assesses that participants would not feel the learning environment safe if they are not familiar with each other.

TMU 23  S assesses that it is appropriate to reflect on critical incidents with peers (that nursing professionals have traditionally but unofficially done).
**MU24** To formalise it into this sort of process does make you think more about it and I think it does, instead of making it thoughtful I think it makes it much more reflective which is probably what the intention was.

**MU25** I would welcome the opportunity to do it again I think after the next secondment, but again it would have to be very carefully set-up.

**MU26** And I think if you're given the choice of the incident that you choose at least it does make sure that you have.. have control of the selection - you're not actually being directed towards an incident that you may not want to disclose or you may not be happy with. So I think as long as you've got the choice over what you disclose and that you're happy with the environment, there's a lot that can be learned from them.

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**TMU 24** S assesses that to reflect on critical incidents as a learning task and with support and guidance of the tutor the analysis is more deeply compared to unofficial discussion of the critical incidents.

**TMU 25** S is motivated to use critical incident analysis in S's future studies implemented in a safe learning environment.

**TMU 26** S thinks that if students have the right to choose the critical incident that would be analysed in a safe learning environment then this learning method really fosters learning.
APPENDIX 7 (8/9)

PHASE 4: Specific description of situated structure
Synthesis of the transformed meaning units into a consistent statement

S’s positive learning experience described mentor’s
Well-organized practices to mentor S and joint principles that they
made to for mentor-mentee relationship
TMU 1, TMU 2, TMU 3, TMU 4, TMU 5, TMU 12, TMU14

The negative experience related to S’s teaching in clinical practice
where S’s planned to topic related to S’s expertise to unknown
nurses, who seemed to be not very interested, S felt unsure TMU
6, TMU 7, TMU 9

S choose the incidents to examine why they were critical
TMU 10

S started to understand demands which belongs to nurse teacher’s
profession, the ability to integrate academic and clinical knowledge
TMU 8

By writing the incidents S learned to examine them from theoretical perspective
and it developed S’s professional knowledge
as an educationalist and S became aware S’s personal features TMU 11, TMU 13, TMU 15

The group reflection was beneficial in a safe learning environment to share experiences with
peers and notice the similarities and differences, which included to the incidents
TMU 16, TMU 17, TMU 21

S’s peers reflected on S’s incidents without
assessing S personally and S felt it necessary to share
the negative incident with peers and tutor to get strength
TMU 19, TMU 20, TMU 23, TMU 24

S learned from peers’ incidents by trying to imagine S’ self to a similar situation and reflected
possible strategies to act
TMU 18

The use of critical incident method in future depends on
the safety of learning environment in the purpose to analyze students’
real experiences
TMU 22, TMU 25, TMU 26
PHASE 5: General structural description or types of general structural descriptions
Synthesis of all the participants’ specific descriptions of situated structures

THE DEVELOPMENT OF TEACHERS’ PROFESSIONAL KNOWLEDGE

Reflection on critical incidents fosters to develop teachers’ professional knowledge base by integrating academic and clinical knowledge. Group reflection with peers in a safe learning environment fosters learning by noticing the similarities and differences in learning experiences and by imagining oneself in a similar situation where the peer has been and reflecting on strategies to act in the situation.

(UK135, UK145: The specific description of a situated structure of two nurse student teachers’ was included in this type of general structural description).
81. **Vornanen, Riitta.** Turvallisuus elämän kysymyksenä. 13-17-vuotiaiden nuorten turvallisuus ja turvattomuuden aiheet. 2000. 334 s. 145 mk

82. **Juvakka, Taru.** Elämää risteyksikohdissa. Hermeneuttiseen fenomenologiaan ja kehollisuuteen perustuva tutkimus 15 - 16-vuotiaiden nuorten toivon kokemuksista heidän jokapäiväisessä elämässään. 2000. 140 s. 100 mk

83. **Jaroma, Anneli.** Kouluus ja tuleva toiminta hoitotyössä. Kysely kätilö-, sairaanhoitaja- ja terveydenhoitajaopiskelijoille. 2000. 153 s. 100 mk

84. **Poutanen, Veli-Matti.** Elämänhallintaa ilman työtä. Tutkimus pitkääikäistyötömyyden seurauksista ja niiden hallinnasta Suomussalmella. 2000. 254 s. 145 mk

85. **Kylmä, Jari.** Dynamics of hope in adult persons living with HIV/AIDS and their significant others - a substantive theory. 2000. 205 p. 145 mk

86. **Töyrä, Eeva.** Hoidon ihmislähdeisyyssä erikoissairaanhoidossa: mittarim kehittäminen ja käyttö. 2001. 120 s. 100 mk

87. **Ala-Haavisto, Raili.** Di-anoigostinen järjestelmä: filosofis-teoreettinen diagnostinen käsittely hoitotööhön ja hoitotieteeseen. 2001. 250 s. 145 mk

88. **Naumanen-Tuomela, Paula.** Työtä terveydenhoitajan asiantuntijuus työikäisten terveydenlääkärinä muuttuvassa yhteiskunnassa. 2001. 117 s. 100 mk

89. **Ensio, Anneli.** Hoitotyön toiminnan mallintaminen. 2001. 136 s. 100 mk