LESSON FIVE

The Nursing Process and Critical Thinking

Introduction

Registered Nurses must use organized, critical thought to make judgements, solve problems and care for clients. We no longer “blindly” follow the orders of the physician, we must develop skills in questioning, reasoning and logical thought. Through the use of the nursing process the nurse ensures that the client is assessed holistically, and that their needs are prioritized in a manner that will achieve optimal health outcomes. The nurse must also ensure that the client and family are involved throughout; an active partner in their own unique health care experience.

Lesson Outcomes

1. Describes the characteristics of a critical thinker.

2. Understands the role of the nurse in problem solving and making clinical judgements.

3. Describes how the nurse uses critical thinking skills when developing healthcare plans.

4. Understands the five components of the nursing process.

5. Explores how to facilitate client ownership of their health care plan.
Required Readings

See required reading list

Websites

The Critical Thinking Community:
http://www.criticalthinking.org/resources/HE/ctandnursing.cfm
**What is Critical Thinking?**

- It is a purposeful, goal-directed thinking process that strives to problem solve patient care issues through the use of clinical reasoning.
- It combines logic, intuition, and creativity.
- It is essential to nursing practice.

> “Unlike the ‘mindless’ thinking we do when going about our daily routines, critical thinking is purposeful, goal-directed reasoning that aims to make judgements based on fact or evidence, rather than guesswork.”
> 
> *Alfaro-Lefevre, 1995*

The purpose of a nurse’s critical thinking could range from helping to resolve a patient’s health issue, or problem solving through a challenge within the health care system. Logic involves reason, sound judgment, and intuition—a feeling about something that is not based on observation or fact. Intuition develops with experience. The real world and the people that make up the real world are often very different than the characters in nursing text books. Sometimes problems and issues require creative thought to come to safe, effective solutions.

You will need to ask yourself:

- What do I really know about this nursing situation?
- How do I know this?
- What options are available to me?
Depending on your level of experience you may be at one of the following three levels of a critical thinker:

**Basic Level:**
- You think that the experts have the right answer for every problem
- Thinking is concrete, there is a right and a wrong
- Decisions are based on rules or principles

**Complex Level:**
- You begin to analyze and examine choices based on independent thought
- Realize that other solutions to problems exist
- You are able to consider the risks and benefits of each solution before making a decision

**Commitment Level:**
- You know and accept that you will need to make choices without help from other professionals
- You assume responsibility for those choices

**How do I improve my critical thinking skills?**

The first step in improving your critical thinking skills involves possessing a sound **knowledge** base of nursing practice. This includes information and theories about nursing care, diseases and treatment, health promotion strategies and so on. Your knowledge base should be holistic as you view each client in terms of their physical, psychological, social, moral, ethical and culture situation. As science, technology and our world continue to change and evolve you must remain committed to continuously adding to your knowledge base. You need to be aware of your practice **standards** that are developed by clinical experts to help guide nursing care. You must be willing to admit when you do not know something, get assistance and seek to learn.

The second part of improving your critical thinking abilities is crucial; you must **experience** hands-on nursing practice. In the clinical area you will learn from watching, talking to clients, families and other professionals, and reflecting on your experiences. Your knowledge base has given you guidelines and principles, experience will help you to learn how to make safe adaptations in client care to meet the unique needs of each client.

Your **attitude** is very important in becoming a good critical thinker. One must be curious to learn about their clients and their struggles, and open-minded to different points of view. You must be flexible and willing to try new ideas. This requires you to be confident in your knowledge and the decisions you make, willing to take responsibility and learn from every decision.
Critical thinking skills are required to move through the nursing process, which will be discussed in the next section. Here are some questions that you can practice asking yourself as you care for your clients:

- What are some relevant facts about this client?
- What else do you need to know? (what data do you need to gather...how will you get this data...)
- What inferences do you draw from the data?
- What action do you need to take?
- What did you decide to do and why?
- What data did you use to make that decision?
- What were your reasons behind the decision?
- Did new information alter your decision?

Please Read:

Lesson Five: Required Readings 1 and 2
Activity 1 Lesson Review

1. In your own words, describe each of the following critical thinking competences:

   a) Problem Solving

   b) Scientific Method

   c) Diagnostic Reasoning

   d) Clinical Inference

   e) Clinical Decision-making
2. For each of the following case studies identify if this is an example of inference, problem solving or diagnostic reasoning. Think about your rationale.

a) You enter the client’s room and not that the intravenous line is not infusing at the ordered rate. You check the flow regulator on the tubing, check if the tubing is kinked or if the client is lying on it, checks the connection between the tubing and the IV catheter and then you check the condition of the site where the IV enters the client’s skin. You adjust the flow rate, and the IV begins to infuse at the correct rate.

b) You observe a new mother breastfeeding and note that the baby is not sucking effectively. The mother complains to you that the baby is fussy, does not urinate much and sleeps for only short periods of time between feedings. You assess the baby and note that he has lost a considerable amount of weight since birth and has poor skin turgor. You conclude that the baby is dehydrated and at risk of becoming malnourished.

c) You sit down to talk to your client who lost his wife one month ago. He tells you that he is having problems sleeping and is very tired all of the time. You ask him to describe his fatigue and he says he feels like he has no energy even to think or concentrate on anything. He complains that he doesn’t feel like paying the bills, doing the housework or making himself any food. You document his complaints and record his problem as ineffective coping related to grieving death of wife.
The Nursing Process

The nursing process is an approach to identifying, diagnosing and treating the health problems of clients. Each part requires the nurse to critically think. The following reviews each part of the nursing process, however it is important for you to remember that it is not always a step-by-step process. In practice you will need to be constantly shifting between assessment, diagnosis, planning, implementation and evaluation as you care for your clients.

Assessment:

Assessment involves collecting data on your client current and past health status in order to develop a plan of care. Data is collected from the client (primary source) as well as secondary sources (family, patient record, health professionals). Data is then analyzed to help determine nursing diagnosis, collaborative problems and the plan. The most common method of data collection is the nursing health assessment, which includes a physical examination as well as a health history interview. You begin your data collection by focusing your assessment based on what you already know about your client or their situation, and then adapting it as you learn more about them. Other sources of data include observation of client behaviour and diagnostic and lab data.

Nursing Diagnosis:

A nursing diagnosis is an identified health problem within the domain of nursing. It is a clinical judgement based on analysis of the data; it could be an actual or a potential health problem. A collaborative problem is a physiological complication that nurses monitor or treat with consultation with other health care professionals.

Some examples of Nursing Diagnoses:

- Activity Intolerance
- Ineffective airway clearance
- Anxiety
- Risk for aspiration
- Disturbed body image
- Bowel incontinence
- Ineffective breathing pattern
- Acute confusion
- Constipation
- Ineffective coping
- Impaired dentition
- Diarrhea
- Risk for falls
Planning:

Once you identify the strengths of the client and the nursing diagnosis you are then able to plan your nursing care. In this phase you will collaborate with the client to make client-centred goals, outline outcomes and plan interventions. Planning also involves setting priorities with the client. They often have multiple nursing diagnoses and complex health problems. It is important to note that the plan of care requires collaboration with the client, family and other health care professionals. It also changes frequently as one issue resolves and others arise.

Implementation:

Implementation involves acting on your plan, while promoting client and family involvement in care. You implement your nursing interventions; these interventions are based on your clinical judgement and knowledge. The goal of your nursing interventions is to improve the client’s health status. Use your critical thinking skills when selecting interventions, including possible interventions for each problem, possible consequences and effects.

Evaluate:

In this phase you identify if your “plan” helped to meet the expected outcomes. If the outcomes have not been met then the process starts again. Perhaps something has changed, perhaps an assessment finding was missed, or perhaps the interventions were not suitable.
The following is an example of a Nursing care plan:

<table>
<thead>
<tr>
<th>Nursing Diagnosis/ Collaborative Problem</th>
<th>Goal: Expected Outcomes</th>
<th>Nursing Interventions</th>
<th>Rationale for why action taken</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data is gathered and analyzed, nursing diagnosis/problems identified and prioritized</td>
<td>Client-centred care is planned, goals and expected outcomes are developed</td>
<td>The actions that will most effectively alleviate the problem</td>
<td>Evidence of knowledge-based practice</td>
</tr>
</tbody>
</table>
| Ineffective airway clearance related to immobility and pain | Adequate ventilation as indicated by no adventitious breath sounds, good air entry and normal $\text{SpO}_2$ levels on room air | • Deep breathing and coughing q 2 h  
• Ambulate q 4 h  
• Ensure receives adequate pain medications  
• Assist with relaxation techniques | • Deep breathing, coughing and ambulation help to mobilize secretions and inflate alveoli  
• If not in pain, will move and cough better |
| Grieving related to loss of independence, needs to move into long-term care facility | Acknowledging feelings of loss & grief. Identifies support systems and healthy coping strategies | • Accept grieving behaviour  
• Use open-ended questions and reflect to promote sharing of feelings  
• Facilitate communication between support systems and client | • Grieving is a unique individual experience |
Activity 2 Lesson Review

1. For each of the following statements identify whether it is a “NURSING” goal or “MEDICINE” goal.

   a) Interventions are aimed at curing illness. _____________________________
   b) Determines need for assistance. ________________________________
   c) Interventions are aimed at helping client meet his or her own needs. _________________
   d) Determines cause of illness. _________________________________
   e) Provides medical treatments. __________________________________
   f) Provides teaching, guidance and counselling. ______________________

2. For each of the following statements identify the phase of the nursing process, assessment, diagnosis, planning, implementation and evaluation.

   a) Involves determining client’s strengths and needs. __________________________
   b) Priorities are set based on life threatening needs, clients’ perception and/or Maslow’s hierarchy. __________________________
   c) A clinical judgement about a client’s actual health problem is made. ________________________
   d) Information is collected from a variety of sources. __________________________
   e) Action that helps to achieve client outcomes or goals. _________________________
   f) Data are grouped together to identify problems. _____________________________
   g) Checking the effectiveness of the plan of care. ______________________________
   h) Identification of what is the desired end result of care. ________________________