Pain assessment

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Pain

- Pain is an unpleasant sensory and emotional experience associated with actual or potential tissue damage.
- **Types of pain**
- Acute,
- persistent (also called chronic),
- nociceptive,
- neuropathetic

Acute pain

- Acute pain has a recent onset (less than 6 months), results from tissue damage, is usually self-limiting, and ends when the tissue heals. It is a stressor initiating a generalized stress response and may cause physiologic signs associated with pain such as an increase in blood pressure, pulse rate, and respiration.

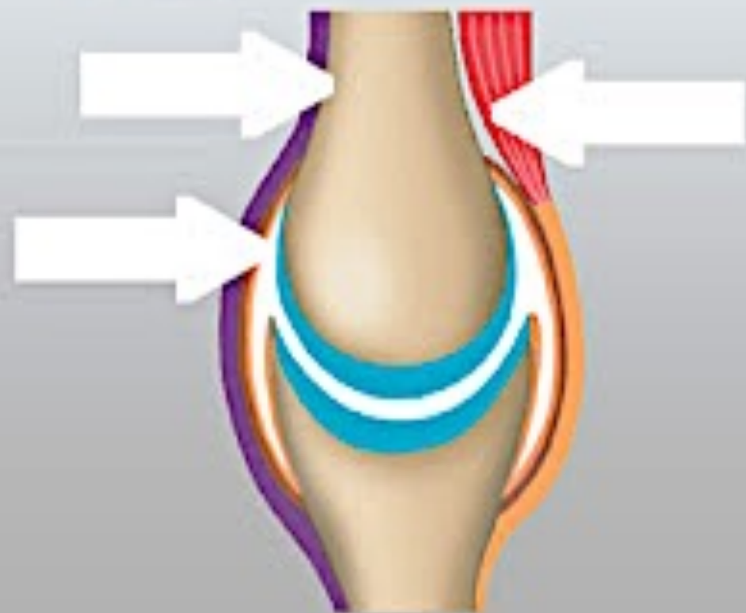
Chronic pain

- By contrast, persistent pain may be intermittent or continuous, lasting more than 6 months. Clinical manifestations of persistent pain are not those of physiologic stress because people adapt to the pain, which may result in symptoms of irritability, depression, and insomnia.

- Nociceptive pain arises from stimulation of somatic structures such as bone, joint, muscle, skin, and connective tissue or from stimulation of visceral organs such as the gastrointestinal tract or pancreas.
- This type of pain results from activation of essentially normal neural systems. In contrast, neuropathic pain occurs from an abnormal processing of sensory input by the central or peripheral nervous systems.

Nociceptive pain:

Nociceptors in tissues send pain signals to the CNS.



Neuropathic pain:

Damage to the nerve itself causes typical pain symptoms.

Present health history

- Do you have any chronic illnesses? If so, do they cause you pain? Describe the pain you experience.
- Some chronic illnesses such as osteoarthritis or the neuropathic pain experienced by patients with diabetes mellitus cause pain. The patient may have both persistent and acute pain from a current disorder.

- Do you take any medication to relieve pain? If so, what do you take and how often? How well do they relieve your pain?
- Both prescription and over-the-counter medications should be noted. Ineffective medications should be reevaluated by the health care provider.

What are your beliefs about discussing your pain with others? How do you usually communicate your pain to others?

- To collect data accurately, nurses need to know the patient's preferred way of communicating pain (i.e., verbally or nonverbally) as well as what words or phrases he or she uses to indicate discomfort. Culture influences how people communicate their pain. In some cultures people may express their pain overtly, whereas other cultures may be stoic, remain silent, or even smile.

- Some people believe that nonverbal communication such as wincing or groaning is sufficient to communicate pain. People with this belief may think that verbally expressing their pain is unnecessary. Communicating pain may not be acceptable in some cultures in which people believe that requesting pain medication is a sign of weakness or a lack of respect for the health care provider.

Problem based health history

- Nurses rely on the patient’s self-reports of pain as the most reliable assessment. When obtaining a patient’s health history related to pain, the nurse should be sensitive to the influences of culture on communication and responses to pain because pain has psychological, social, spiritual, and physical dimensions.

- Nurses collect data from patients about their pain using a symptom analysis and applying the mnemonic OLD CARTS, which includes the Onset, Location, Duration, Characteristics, Aggravating and Alleviating factors, Related symptoms, Treatment by the patient, and Severity.

Onset

- When does the pain occur? During activity? Before or after eating?
- The answer may help determine the timing, situation, and source of the pain. For example, physical activity may aggravate joint pain or eating may increase pain from a peptic ulcer.
- Does the pain occur suddenly or gradually?
- The answer may help determine the cause of the pain. Acute pain has a sudden onset. Ischemic pain gradually increases in intensity.

- What do you think is causing your pain? Why do you think the pain started when it did?
- Being aware of a patient’s insight into the cause of the pain is a patient-centered approach and may help determine its occurrence and assist in pain management.

Location

- Where do you feel the pain? Can you point to the location(s)? Does the pain radiate or change its location?
- A description of the pain's location may provide information about its cause and type (e.g., somatic versus visceral)
- The patient may describe the pain location away from the site of the pathology when the pain is referred pain. Chest pain may radiate up the jaw or down the left arm in men, for example.

Duration

- How long does the pain last? Is it constant or intermittent? If it is intermittent, how often does it occur, and how long does it last?
- Answers to these questions may suggest a cause of the pain. For example, patients with mild peripheral artery disease experience intermittent pain in the legs when walking as a result of ischemia. When they stop walking, their pain is relieved.
- As the disease progresses, the pain experienced when they are walking becomes constant and is not relieved by rest.

Characteristics

- Describe what the pain feels like.
- The McGill Pain Questionnaire in Fig. 6-3 is a multidimensional tool that provides information about a patient’s pain characteristics and the effect on the patient’s daily life.
- 1 Somatic pain is usually well localized and described as aching or throbbing. Visceral pain caused by a tumor is described as aching and well localized; but, if it is caused by an obstruction, the pain may be poorly localized and described as intermittent cramping.

Aggravating Factors

- What makes the pain worse?
- The answer may help to determine the cause of the pain or understand the impact it may have on the patient. For example, patients with a penetrating gastric peptic ulcer report that their pain increases when they eat. Patients who have pneumonia may complain of a sharp pain when they take a deep breath (termed pleuritic chest pain).

Alleviating Factors

- What relieves the pain?
- For example, patients may report that a change in position, massage or applying heat or cold relieves their pain.

Related Symptoms

- When you experience the pain, do you notice other symptoms at the same time such as palpitations; shortness of breath; sweating; rapid, irregular breathing; nausea; or vomiting?
- During low-to-moderate acute pain intensity the sympathetic nervous system may cause palpitations, diaphoresis, or increasing respiratory rate; whereas during severe or deep pain the parasympathetic nervous system may cause pallor; rapid, irregular breathing; nausea; and vomiting.

Treatment by the Patient

- How have you tried to relieve this pain? How effective have these measures been?
- A broad, open-ended question is asked purposefully to encourage patients to report all forms of therapy (i.e., medications and alternative therapies). The response helps the nurse to know which therapies to continue and which to withdraw.

Severity

- How would you describe the intensity, strength, or severity of the pain?
- People from different cultures use various communication styles to express their pain.
- Assessment tools allow some patients to communicate the severity of their pain (pain quantity).
- Frequently used pain rating scales are the numeric rating scale (NRS) and the FACES rating scale.

- How severe do you allow your pain to become before you take medication to relieve it?
- This question seeks knowledge about the patient’s pain tolerance, which can be influenced by culture and the pain experience as well as the expectations of pain and its relief.

Response to the pain

- How do you react to your pain? How do you express it (e.g., anger, frustration, crying, or no expression at all)? What do you fear most about your pain? What problems does it cause?
- Pain can affect people physically, psychologically, socially, and spiritually. Patients’ responses to

- pain may be influenced by their culture and previous experiences. Pain can evoke a variety of emotional responses such as anxiety, fear, depression, and anger. Conversely, anxiety and fear can exacerbate the experience of pain.5 The nurse should acknowledge these feelings as the patient’s personal response to pain without trying to change them.

- What has been your past experience with pain and pain relief?
- This question addresses the cognitive response to pain. Patients use their past experiences to respond to pain. When nurses know what these experiences are, they can help patients with interventions to meet their goals for pain relief.

- Do you have any concerns about taking medication for pain relief?
- Patients have reported not taking prescribed pain medication due to fear of addiction, fear of tolerance, concerns about adverse reactions, the need to be a "good patient", and fear of masking symptoms. These concerns can be addressed through patient education

- How has the pain affected your quality of life? How has it altered your life (e.g., does it interfere with your sleep, appetite, mood, walking ability, work, relationships with others)?
- Those who have compensated for chronic pain or adjusted to it may perceive a higher quality of life than those who have not adjusted to the pain.
- However, chronic pain is often associated with a sense of hopelessness and helplessness.
- Patients with chronic pain may report depression, difficulty in sleeping and eating, and a preoccupation with the pain.

Pain Reassessment

- After taking the pain medication and/or using other pain-relieving strategies, how would you describe your pain?
- The Clinical Practice Guidelines (CPG) of the Agency for Health Care Policy and Research (AHCPR) state that pain should be reassessed 30 minutes after administering a parenteral analgesic and within 1 hour of oral analgesic drug administration.

Assessing the Pain of Patients who Cannot Communicate

- First, attempt a self-report from the patient or explain why a self-report cannot be used. When patient self-reports are not possible, the nurse looks for any potential causes of pain, including pathologic conditions and common problems or procedures known to cause pain such as surgery, rehabilitation, wound care, positioning, blood draws, heel sticks, or any history of persistent pain.

- The third approach is to list patient behaviors that may indicate pain.
- Fourth, the nurse identifies behaviors that caregivers and others who are knowledgeable about the patient think may indicate pain, called proxy reporting. Finally the nurse attempts an analgesic trial by giving an analgesic ordered by the provider that is appropriate for the estimated intensity of pain based on the patient's pathology and analgesic history, even when the patient can not communicate pain. Notice any changes in behavior when the analgesic becomes effective.