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MED

Meningitis – First Aid

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Learning objectives

- Student will learn warning signs of meningitis.
- Student will learn what is meningeal phenomena.

Meningitis - inflammation of the meninges

- Life threatening disease
- Worldwide occurrence
- Occurrence across all ages
- Several pathogens – most common - bacteria
- Danger in delay
- Fast transport to the hospital required
- Diagnosis and initiation of therapy optimally within an hour
- High mortality, late consequences after the disease

Meningitis - warning signs

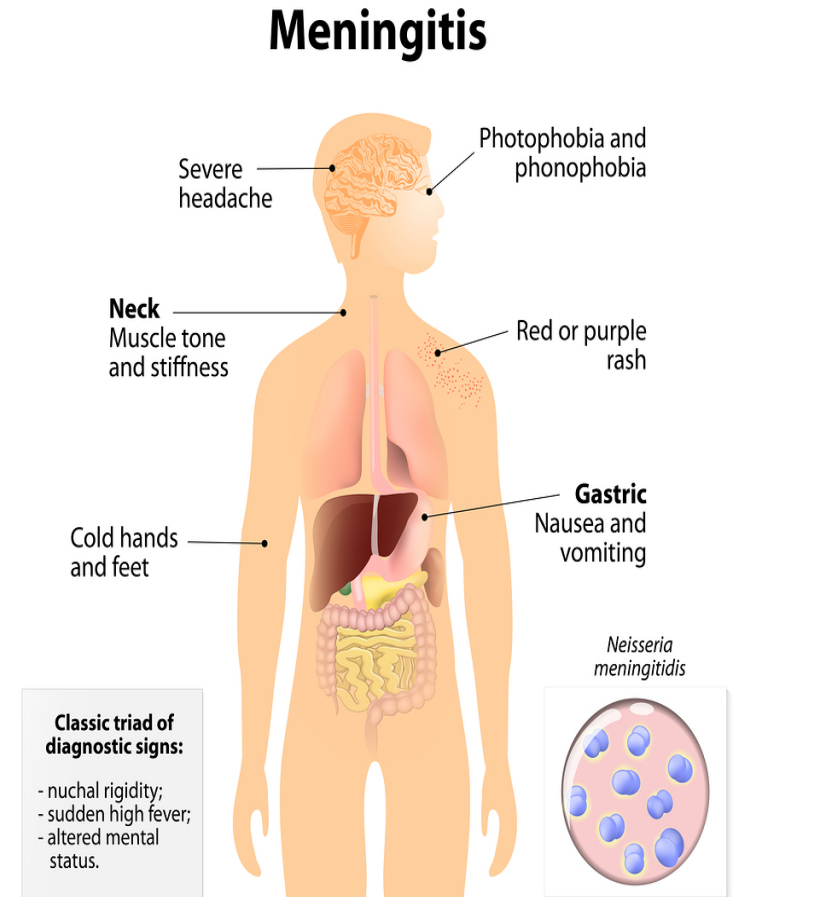
- Different in different age groups
- **Newborns** - nonspecific
- Irritation or apathy, vomiting, eating disorders, arched large fontanelle, less commonly opposition of the neck and convulsions
- **Childhood**
- Fever and vomiting, inability to pull the head to the chest, less often light-headedness, convulsions, impaired consciousness
- Subcutaneous bleeding is possible in all age groups - **PETECHIA**

Meningitis - warning signs

Adults

- Triad: Fever, opposition of the neck, altered mental status
- Other common symptoms:
 - ✓ Headaches
 - ✓ Light intolerance - PHOTOPHOBIA
 - ✓ Noise intolerance - PHONOPHOBIA

In all age groups possible bleeding up to subcutaneous tissue - **PETECHIA**



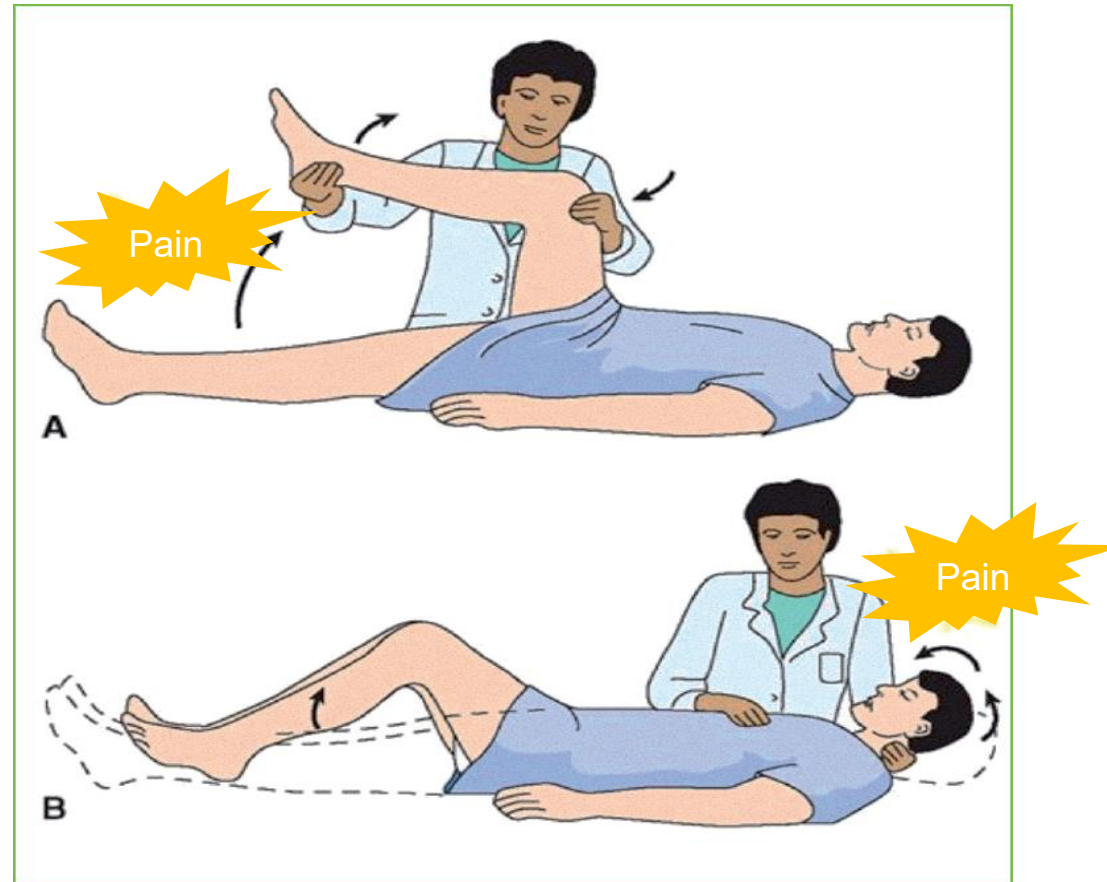
Meningitis – warning signs



Meningitis - meningeal phenomena

- Opposition (stiffening) of the neck - the inability of the patient to pull head to his chest
- Reflective bending of the legs in the knees during a passive forward bend of the head
- The patient has legs in flexion when seated and at least one hand in a row
- In meningitis, the patient already feels pain in the lumbar region when the legs are slightly raised and bends at the knees

Meningitis – meningeal phenomena



Picture: A – Kernig sign, B – Brudzinsky sign

Meningitis – prehospital first aid

- Recognition of warning signs
- Organization of transport to the hospital - emergency medical service (better 155 than 112)
- Calming the patient and the environment
- Position with raised upper half of the body
- Follow the basic life functions - breath, pulse, consciousness
- Avoid heat loss in children
- Don't underestimate the situation
- Wait for the arrival of the emergency medical crew

Learning outcomes

- Student is able to evaluate the state of consciousness, breathing and circulation.
- Student is able to recognize the symptoms of CNS diseases.
- Student knows basic principles of first aid in CNS infections.

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