

Module 2 Special Neurology

Situational tasks

1. The condition of a patient who is in a hospital with a diagnosis of "brain tumor" has deteriorated sharply: severe headache, incessant vomiting, instability of AT, bradycardia, mydriasis, paresis of upward gaze. What complication arose in this case, name the syndrome:

- A. Focal
- B. * Dislocation
- C. Meningeal
- D. Intoxication
- E. Cerebral

2. The condition of a patient who is in a hospital with a diagnosis of "cerebellar tumor" has deteriorated sharply: severe headache, incessant vomiting, instability of AT, bradycardia, mydriasis, paresis of upward gaze. What complication arose in this case, name the syndrome:

- A. Focal
- B. * Bruns
- C. Meningeal
- D. Burdenko-Kramer
- E. Cerebral

3. The child is 3 months old. The head volume at birth is 35 cm, during examination – 45 cm. Objectively: symptoms of excitability, protrusion of the fontanel. The dimensions of the greater fontanel are 4x4 cm, the sagittal suture is open up to 1 cm. The child regurgitates and vomits, lags behind in psychomotor development. On the fundus – phenomena of stagnation. These are:

- A. microcephaly
- B. meningitis
- C. rickets
- D. * hydrocephalus
- E. craniosynostosis

4. According to the results of MRI of the brain, the patient was diagnosed with metastatic brain damage. What localization of the tumor most often metastasizes to the brain?

- A. Kidney
- B. Prostate
- C. Adrenal
- D. * Lung
- E. Stomach

5. According to the results of MRI of the brain, the patient was diagnosed with metastatic brain damage. What examination should be performed first to determine the possible primary focus?

- A. * CT scan of the lungs
- B. Ultrasound of the kidneys
- C. Ultrasound of the thyroid gland
- D. Ultrasound of the prostate gland
- E. Colonoscopy

6. The doctor diagnosed the patient with "Epileptic disease with frequent generalized seizures." What number of seizures in the patient allowed to determine this frequency?

- A. 4 or more per week
- B. 4 or more per year
- C. 4 or more per day
- D. * 4 or more per month
- E. 4 or more per six months

7. The doctor diagnosed the patient with "Epileptic disease with rare generalized seizures". What number of seizures in the patient made it possible to determine this frequency?

- A. 1-2 per week
- B. 1-2 per year
- C. 1-2 per day
- D. 1-2 per six months
- E. * 1-2 per month

8. The doctor diagnosed the patient with "Epileptic disease with moderate frequency of generalized seizures". What number of seizures in the patient is the criterion for "moderate frequency"?

- A. 3 per week
- B. 3 per year
- C. 3 per day
- D. 3 per six months
- E. * 3 per month

9. The doctor diagnosed the patient with "Epileptic disease with frequent partial seizures". What number of seizures in the patient made it possible to determine this frequency?

- A. 5 or more per week
- B. 5 or more per year
- C. * 5 or more per day

D. 5 or more per month

E. 5 or more per six months

10. The doctor diagnosed the patient with “Epileptic disease with rare partial seizures”. What number of seizures in the patient made it possible to determine this frequency?

A. 1-2 per week

B. 1-2 per year

C. * 1-2 per day

D. 1-2 per month

E. 1-2 per six months

11. The doctor diagnosed the patient with “Epileptic disease with partial seizures of medium frequency”. What number of seizures in the patient made it possible to determine this frequency?

A. 3-4 per week

B. 3-4 per year

C. * 3-4 per day

D. 3-4 per month

E. 3-4 per six months

12. The doctor decided to prescribe combination therapy to a patient with asynchronous and atypical seizures, in whom monotherapy was ineffective. Which of the combinations listed below is undesirable.

A. Lamotrigine/topiramate

B. Valproate/topiramate

C. Valproate/lamotrigine

D. * Carbamazepine/phenytoin

E. Carbamazepine/valproate

13. The physician has decided to prescribe combination therapy to a patient with asynchronous and atypical seizures in whom monotherapy has been ineffective. Which of the following combinations is undesirable.

A. Lamotrigine/topiramate

B. Valproate/topiramate

C. Valproate/lamotrigine

D. * Carbamazepine/lamotrigine

E. Carbamazepine/valproate

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- C. Valproate/lamotrigine
- D. * Valproate/phenytoin
- E. Carbamazepine/valproate

16. A patient went to a neurologist for an examination with complaints of headache, memory loss, and vision impairment. On the fundus: swelling of the optic disc on the right, atrophy of the left optic nerve. For which tumor localization is this eye picture typical?

- A. * Frontal lobe pole
- B. Temporal lobe pole
- C. Parietal lobe
- D. Occipital lobe
- E. Frontal lobe

17. A patient went to a neurologist for an examination with complaints of headache, memory loss, and vision impairment. On the fundus: swelling of the optic nerve disc on the right, atrophy of the left optic nerve. What is the name of this eye syndrome?

- A. Calus I
- B. Chiasmal
- C. * Foster-Kennedy
- D. Calus II
- E. Argyle-Robertson

18. Patient B has been suffering from epilepsy for 10 years. He took valproate throughout the entire period, but due to the increased frequency of seizures, the doctor adjusted the treatment and

prescribed a new generation drug. Tell me which of the following drugs belongs to the new generation:

- A. valproate
- B. * keppra
- C. carbamazepine
- D. ethosuximide
- E. clonazepam

19. The patient consulted a neurologist with complaints of periodic olfactory hallucinations. Tell me where the lesion may be located?

- A. left frontal lobe
- B. * temporal lobe
- C. parietal lobe
- D. occipital lobe
- E. right frontal lobe

20. Patient N. has been suffering from epilepsy for 14 years. He took valproate throughout the entire period, but due to the increase in the frequency of seizures, the doctor adjusted the treatment and prescribed a new generation drug. Tell me which of the following drugs belongs to the new generation:

- A. valproate
- B. ethosuximide
- C. carbamazepine
- D. * gabapentin
- E. clonazepam

21. The patient has been suffering from epilepsy for 12 years. During the entire period, he took valproate, but due to the increase in the frequency of seizures, the doctor adjusted the treatment and prescribed a new generation drug. Tell me which of the following drugs belongs to the new generation:

- A. valproate
- B. * tiagabine
- C. carbamazepine
- D. ethosuximide
- E. clonazepam

22. Patient Ya., 35, is being treated in the endocrinology department with Itsenko-Cushing syndrome. The doctor suspected the presence of a pituitary tumor. Tell me which visual impairment is the most common manifestation of this pathology?

- A. Homonymous hemianopsia
- B. * Bitemporal hemianopsia
- C. Binasal hemianopsia
- D. Quadrant anoxia
- E. Amaurosis

23. A patient with a brain tumor is troubled by attacks of Jacksonian motor epilepsy. Where is the lesion localized?

- A. * precentral gyrus
- B. postcentral gyrus
- C. middle frontal gyrus
- D. inferior frontal gyrus
- E. superior temporal gyrus

24. The patient turned to a neurologist with complaints of morning headache, which is sometimes combined with nausea, increased fatigue, decreased memory and performance. The complaints listed above have been troubling for about 3 months. The staff noticed that the patient's behavior had changed: she was inhibited, making numerous mistakes in performing her professional duties. Ob-no: the mood was depressed, (+) Bekhterev's syndrome on the left, right-sided reflex pyramidal insufficiency. What pathology can be suspected?

- A. encephalopathy
- B. depression
- C. * brain tumor
- D. stroke
- E. encephalitis

25. The patient consulted a neurologist with complaints of morning headache, which is sometimes combined with nausea, increased fatigue, decreased memory and working capacity. The complaints listed above have been bothering her for about 3 months. The staff noticed that the patient's behavior had changed: she was inhibited, making numerous mistakes in performing her professional duties. Ob-no: mood background is depressed, (+) Bekhterev's syndrome on the left, right-sided reflex pyramidal insufficiency, (+) Janishevsky's grasping phenomenon. Where is the likely localization of the pathological focus?

- A. Parietal region
- B. * Frontal region
- C. Occipital region
- D. Temporal region
- E. Cerebellum

26. The patient turned to a neurologist with complaints of morning headache, which is sometimes combined with nausea, increased fatigue, decreased memory and working capacity. The complaints listed above have been bothering for about 3 months. The staff noticed that the patient's behavior had changed: she was inhibited, made numerous mistakes in performing her professional duties. Ob-no: mood background is depressed, (+) Bekhterev's disease on the left, right-sided reflex pyramidal insufficiency, (+) Janishevsky's grasping phenomenon. Which research method should be prescribed first?

- A. EEG
- B. Ultrasound
- C. * CT
- D. Echo-EG
- E. Lumbar puncture

27. The patient turned to a neurologist with complaints of morning headache, which is sometimes combined with nausea, increased fatigue, decreased memory and working capacity. The complaints listed above have been bothering for about 3 months. The employees noticed that the patient's behavior had changed: she was inhibited, made numerous mistakes in performing her professional duties. Ob-no: mood background is depressed, (+) Bekhterev's disease on the left, right-sided reflex pyramidal insufficiency, (+) Janishevsky's grasping phenomenon. Which research method should be prescribed first?

- A. EEG
- B. Ultrasound
- C. * MRI
- D. Echo-EG
- E. Lumbar puncture

28. A ten-year-old child developed violent contractions of the muscles of the limbs, face, and trunk. Specify the localization of the pathological focus:

- A. pallidum-nigral system
- B. * neostriatal system
- C. cerebellum
- D. fronto-prefrontal area
- E. precentral gyrus

29. A patient was admitted to the clinic with peripheral paresis of the arms, with increased reflexes and muscle tone in the legs, and dysfunction of the pelvic organs. Where is the tumor localized?

- A. at the level of the upper cervical region
- B. at the level of the occipital foramen
- C. * at the level of the cervical thickening

D. at the level of the thoracic region

E. at the level of the lumbar thickening

30. A patient was admitted to the clinic with central tetraparesis, conductive sensory disorders, and constant hiccups. Where is the tumor localized?

A. * at the level of the upper cervical

B. at the level of the occipital foramen

C. at the level of the cervical thickening

D. at the level of the thoracic region

E. at the level of the lumbar thickening

31. A patient was admitted to the clinic with central paresis of the lower extremities, absence of abdominal reflexes, conductive sensory disorders from the level of D 6. Where is the tumor localized?

A. at the level of the upper cervical region

B. at the level of the occipital foramen

C. at the level of the cervical thickening

D. * at the level of the thoracic region

E. at the level of the lumbar thickening

32. A patient was admitted to the clinic with peripheral paresis of the legs, sensory disorders in the legs, with true urinary and fecal incontinence. Where is the tumor localized?

A. at the level of the upper cervical region

B. at the level of the occipital foramen

C. at the level of the cervical thickening

D. at the level of the thoracic region

E. * at the level of the lumbar thickening

33. The patient has an increase in the superciliary arches, nose, auricles, lower jaw and distal extremities. What tumor can be suspected in this patient:

A. * pituitary adenoma

B. oligodendroglioma

C. ependymoma

D. meningioma

E. astrocytoma

34. The patient developed and gradually increased sensory and amnesic aphasia 1 month ago. Where is the lesion located?

- A. right temporal lobe
- B. left frontal lobe
- C. left parietal lobe
- D. * left temporal lobe
- E. right frontal lobe

35. In a patient diagnosed with a tumor, the leading manifestation is sensory aphasia. Where is the tumor located?

- A. right temporal lobe
- B. left frontal lobe
- C. left parietal lobe
- D. * left temporal lobe
- E. right frontal lobe

36. The patient was diagnosed with a tumor of the precentral gyrus. Which of the following signs may be present in the patient:

- A. * Jacksonian motor epilepsy
- B. anosmia
- C. monoanesthesia
- D. hemianopsia
- E. alexia

37. A pituitary tumor was suspected in a patient with acromegaloid facial features. What is the most common visual impairment of this pathology?

- A. Homonymous hemianopsia
- B. * Bitemporal hemianopsia
- C. Binasal hemianopsia
- D. Quadrant anopsia
- E. Amaurosis

38. A patient with acromegaly facial features was suspected of having a pituitary tumor. What are the changes on the craniogram characteristic of this pathology?

- A. Osteosclerosis of the sella turcica wall
- B. * Osteoporosis of the sella turcica wall
- C. Divergence of sutures
- D. Uncharacteristic changes
- E. Osteoporosis of the apex of the pyramid

39. The patient has enlarged superciliary arches, nose, auricles, lower jaw and distal extremities. What location of tumor can be suspected in this patient:

- A. * pituitary
- B. thalamus
- C. corpus callosum
- D. frontal lobe
- E. temporal

40. In a patient suffering from epileptic disease, a focus of pathological activity was detected on EEG. State the pathophysiological properties of the epileptic focus:

- A. increased synaptic conductivity
- B. synchrony of discharges
- C. determinism
- D. * all of the above
- E. synchrony of discharges

41. In a patient suffering from epileptic disease, a focus of pathological activity was detected on EEG. Which of the following pathophysiological properties is not characteristic of an epileptic focus:

- A. increased synaptic conductivity
- B. synchronous discharges
- C. determinism
- D. * decreased synaptic conductivity
- E. synchronous discharges

42. Patient N., 35 years old, had a feeling of numbness of the skin of the forehead on the left, after 1 month the numbness descended to the cheek and paroxysmal pain in the left half of the face joined, which were not relieved by analgesics. Another month later, she noted double vision when looking to the left. Ob-no: slight convergent squint due to the left eyeball, does not bring the left eyeball outward, hypalgesia with hyperpathy in the areas of the forehead and cheek on the left. What pathology can be suspected?

- A. arachnoiditis
- B. multiple sclerosis
- C. * tumor
- D. neuropathy
- E. neuralgia