

Questions for Final Exam
BSc Physiotherapy
- academic year 2016/2017

1. What does the Dastre- Morat's Law say?
2. Grothus – Draper Law.
3. Face galvanization in facial palsy (VII cranial nerve).
4. Galvanic current therapy of the larynx.
5. Longitudinal galvanic therapy of lower limbs – sciatica.
6. The phenomenon of electrolysis within the electrodes during electrotherapy.
7. Iontophoresis with Fastum (NSAID- non steroid anti-inflammatory drug) on the elbow joint.
8. Iontophoresis with contractubex on the cicatrix of the forearm.
9. The types of diadynamic currents. Characterise the currents with analgesic effects.
10. The application of diadynamic currents in cyanosis of hands.
11. Characterise Traebert currents.
12. The application of Traebert currents – upper thoracic spine arrangement (EL2).
13. The application of Interferential Current Therapy (ICT) in peroneal neuralgia.
14. The application of Kotz currents in lumbar spine pain.
15. The application of Russian stimulation to the left biceps brachii.
16. Gate control theory of pain in the TENS current.
17. Low frequency TENS currents on the wrist.
18. Laser therapy. Discuss the methodology in lumbar spine discopathy.
19. Ultrasounds. Discuss the methodology of ultrasound therapy in the air and water environments.
20. Discuss methodology of ultrasound therapy in the heel spur (plantar fasciitis).
21. Erythema meter test (UV radiation) for an adult person.
22. Sollux lamp radiation (IR) in frontal sinusitis.
23. Interferential (Nemec's) currents. Discuss its application on lumbar spine.
24. Interferential (Nemec's) current 4-pole (4P) therapy in the acute shoulder joint pain.
25. Low-frequency magnetic field therapy on the lumbar spine – chronic state
26. Low-frequency magnetic field therapy on the knee – acute state.
27. Discuss the methodology of electrical stimulation of healthy muscles – Kotz or TENS currents – m. quadriceps femoris.
28. Discuss the methodology of electrical stimulation of floppy paralysed muscles – the face muscles.
29. Discuss the methodology of electrical stimulation of floppy paralysed muscles – peroneus muscles.
30. Discuss the methodology of application of Finnish sauna therapy.
31. Discuss the methodology of systemic cryotherapy.
32. Enumerate cryotherapy treatments and discuss the methodology of one of them.
33. Explain the following terms: reobasis, chronaxy, motor point.
34. General indications and contraindications to the electrical current therapy.
35. What is subjective examination in physical assessment? What kind of info does it give to the therapist?
36. What are the parts (components) of patient's interview? Describe them shortly.

37. Characterize types of static local examination for the sake of kinesiotherapy (examples with short description)
38. What is a neurological assessment (components, description) as a part of physical examination?
39. Describe what is a dynamic local (segmental) examination (2 examples)
40. Please give example of a static general examination for the sake of kinesiotherapy and explain the methodology of it.
41. Characterize dynamic general type of examination (1 example)
42. What are the rules of recording ROM according to SFTR system?
43. What are the general rules during ROM assessment?
44. What are the methods of muscular strength assessment in kinesiotherapy? (2 examples)
45. What are the indicator muscles, please give the examples for UE (upper extremity), LE (lower extremity)?
46. What is the role of functional assessment in diagnostic?
47. Give me 3 types of standardized functional scales examples
48. Biomechanical and neuromuscular (kinematic) analysis of physiological gait?
49. Examination of upper limb's reaching and grasping activity. What does the PT should pay attention to / focus on?
50. What kind of linear measurements are there in physical examination (objective examination) for UE and LE?
51. Which special tests (functional test) do you know that are designed to assess spine mobility? (i.e. Schober test)
52. What kind of special tests (functional tests) do you know for upper limb / shoulder girdle assessment (at least 6 examples)?
53. Which test is used for examination hidden flexors contracture in a hip joint?
54. What are the aims of Patrick's, Mennel's and Ober's tests?
55. The use of Lasegue test (straight lap raise test) and modalities of SLR?
56. Trendelenburg Sign and Duchenne Sign – what kind of deficits do they indicate and what are their consequences for the future?
57. Indications (aims) and contraindications for passive and actively-passive exercises?
58. Classification of therapeutic exercises (could be according to the aims)and in other words: objectives of therapeutical exercises (classification of therapeutical exercises)
59. The rules of postisometric relaxation

60. What are the contraindications for redressive (tractions) or relaxation exercises?
61. Please present (show) examples of closed and opened kinetic chain exercises. What are the differences between those exercises?
62. The measurements of limbs' circumferences (perimeters)
63. Example of goniometric measurement of ROM for any joint and SFTR system documentation rules
64. The rules of muscular strength assessment according to Lovet (Kendall) scale.
65. What are synergy exercises? Types, indications, contraindications
66. Passive exercises and assistive exercises: objectives, indications, types of exercises (types of passive and assistive force), examples of exercises.
67. Scoliosis. Types of scoliosis (classification), signs of scoliosis, assessment tools.
68. Stretching exercises: indications, contraindications, types, methodology of one type from: PIR, PNF stretching (hold -relax, contract-relax techniques)
69. What are the determinants of proper resistive exercises? How are we training for the strength and how for endurance?
70. Strength training. Describe De Lorme and McQueen (Oxford) regimes in muscular strength exercises (strength training)
71. What are PNF basic procedures?
72. What is PNF pattern?
73. Describe Vojta method – main objectives and principles of treatment for children or adults
74. What is neurophysiological examination of newborns / infants / children (components of early screening examination)?
75. What is the optimal model of stabilisation of the trunk (according to DNS approach)?
76. Types of orthopedic – locomotion, rehabilitation equipment – few examples with medical diagnosis that may need that.
77. Characterize orthopedic equipment for children and youths – examples
78. What is neurophysiological examination of newborns / infants / children (components of early screening examination)?
79. Functional analysis of gait, cycle and phases of gait, parametres of normal gait.
80. Classical massage – definition, techniques (objectives, the influence of technique on tissues), the rules of classical massage (general rules, directions, strength of stimulus, tempo).
81. Classical massage – patient's and therapist's preparation, rules of preparing the place for a massage, indications and contraindications for a massage.
82. Joint contractures – the causes, prevention, possible physiotherapy treatment methods.
83. Bedsores – definition, causes, extent, risk factors, prevention.

84. Cerebral palsy – definition. Enumerate the types of cerebral palsy and describe one of them.
85. Cerebral strokes – types, causes, characteristics.
86. The objectives of early bed rehabilitation in cerebral stroke.
87. Ischaemic stroke – characteristics, causes and rehabilitation procedures in an early phase.
88. Haemorrhagic stroke – characteristics, causes and rehabilitation procedures in an early phase.
89. Spasticity – definition, characteristics, examples of physiotherapy treatment.
90. Multiple sclerosis – characteristics of the disease, physiotherapy in multiple sclerosis.
91. Herniated intervertebral disc in lumbosacral spine – causes, symptoms, rehabilitation procedures.
92. Rehabilitation of patients with low back pain in an acute and chronic state – enumerate symptoms in both states, give examples of physiotherapy treatment.
93. Parkinson’s disease – characteristics, physiotherapy treatment.
94. Brachial plexus injury – causes and characteristics.
95. Shoulder girdle disorders – enumerate the most common diseases, describe one of them, discuss possibilities of physiotherapy treatment.
96. Pulmonary rehabilitation – describe the elements of therapy helping in removing secretions from the bronchial tree, discuss drainage positions, tell, what is the importance of early breathing exercises in the surgical ward.
97. Cardiac rehabilitation – A and B models of physiotherapy after myocardial infarction – when do we use them, how long do they last, indications and contraindications for Exercise Treadmill Test.
98. Peripheral nervous system damage – describe one of the most common examples (fibular, tibial, radial, facial nerve damage), present general rehabilitation rules and physiotherapy procedures.
99. Spina bifida – characteristics of the disease, forms, symptoms, physiotherapy treatment.
100. Duchenne muscular dystrophy – characteristics, forms, symptoms, physiotherapy treatment.