

## EXAM QUESTIONS ON PEDIATRICS FOR 5 YEARS STUDENTS FOR 2020/2021 ACADEMIC YEAR

- 1. Complex evaluation of child health condition. Determining criteria.
- 2. Complex evaluation of child health condition. Characterizing criteria.
- 3. Immunoprophylaxis. Definition. Types.
- 4. Vaccination schedule for children.
- 5. Age-related development periods.
- 6. Anatomy and physiology of the musculoskeletal system in children. Agerelated features. Teeth eruption.
- 7. Anatomy and physiology of digestive system in infants and toddlers. Agerelated features. Carbohydrate, protein, fat digestion in gastrointestinal tract.
- 8. Assessment of physical growth (length/height, body weight, head and chest circumferences). Growth charts.
- 9. Factors influencing physical growth and development.
- 10. Sexual development. Sexual maturity rating (Tanner's stages).
- 11. Language development of infant and children (stages).
- 12. Key developmental milestones (gross motor development).
- 13. Key developmental milestones (fine motor development).
- 14. Anatomy and physiology of the respiratory tract in children. Age-related features.
- 15. Anatomy and physiology of the cardiovascular system in children. Age-related features.
- 16. Anatomy and physiology of the urinary tract in children. Age-related features. Kidney function tests.
- 17. Complete blood count with white blood cell differential in children. Children's reference ranges.
- 18. Biological role and advantages of breastfeeding.
- 19. Contraindications to breastfeeding.
- 20. Modern approach to organization of newborn feeding. Feeding of full term and preterm newborn babies.
- 21. Breastfeeding. Definitions. Rules.
- 22. Weaning and complementary feeding. Timing and rules of solid foods introduction.
- 23. Ten steps to successful breastfeeding by WHO.
- 24. Diet for healthy breastfeeding mothers.
- 25. Hypogalactyia. Determining adequacy of milk supply. Management.
- 26. Partial (Combine) breastfeeding and formula-feeding. Sings of inadequacy breast milk supply. Timing of solid foods introduction.

- 27. Classification of substitute breast milk formulas.
- 28. Assessment of the gestational age of the newborn. Morphologic and functional maturity. Initial and daily care of newborns.
- 29. Assessment of the status of newborns after birth by Apgar score.
- 30. Transitory conditions of neonates.
- 31. Purulent-inflammatory diseases of skin. Clinical manifestation.
- 32. Hemolytic disease of the newborn. Classification. Diagnosis. Principles of treatment.
- 33. Neonatal sepsis. Classification. Risk factors. Diagnosis. Principles of treatment.
- 34. Differential diagnosis of physiologic and pathologic jaundice.
- 35. Definition of «nutritional rickets». Risk factors for nutritional rickets. Pathogenesis of rickets.
- 36. Vitamin D biologic function. Role of vitamin D in rickets development.
- 37. Rickets. Clinical signs. Classification.
- 38. Diagnosis of rickets. Instrumental and laboratory tests. Assessment of vitamin D status.
- 39. Prevention and treatment of nutritional rickets. Vitamin D toxicity.
- 40. Infantile tetany (spasmophilia). Latent and manifest form. Diagnostics. Treatment.
- 41. Hypervitaminosis D. Classification. Diagnostics. Treatment.
- 42. Bronchitis. Clinical signs and diagnostic criteria. Treatment.
- 43. Croup. Causes. Clinical presentation. Treatment.
- 44. Epiglottitis. Causes. Symptoms. Treatment.
- 45. Differential diagnosis of the upper and lower airway obstructions.
- 46. Lower airway obstruction and wheezing syndrome. Clinical presentation. Treatment.
- 47. Pneumonia. Classification.
- 48. Pneumonia. Clinical signs and diagnostic criteria.
- 49. Pneumonia. Indications for hospitalization. Treatment.
- 50. Pneumonia. Pulmonary complications. Principles of treatment.
- 51. Pneumonia. Extrapulmonary complications. Principles of treatment.
- 52. Atypical pneumonia in children. Treatment.
- 53. Foreign body aspiration. Diagnostics. Emergency help.
- 54. Chronic lung diseases. Causes. Clinical manifestations. Morphological changes.
- 55. Chronic lung diseases of genetic origin: cystic fibrosis (pulmonary manifestations), primary ciliary dyskinesia (Kartagener syndrome),  $\alpha_1$ -antitrypsin deficiency.
- 56. Bronchial asthma. Definition. Classification.
- 57. Bronchial asthma. Age related clinical manifestations
- 58. Bronchial asthma. Diagnosis in children.
- 59. Principles of asthma pharmacotherapy. Long-term controller and quick-relievers medications.

- 60. Stepwise (step-up and step-down) approach to long-term management of asthma.
- 61. Asthma exacerbations and status asthmaticus. Emergency treatment.
- 62. Atopic dermatitis in children.
- 63. Acute rheumatic fever. Definition. Risk factors and etiology. Pathogenetic stages. Classification
- 64. Acute rheumatic fever. Diagnostic criteria.
- 65. Rheumatic chorea in children (Sydenham chorea). Definition. Clinical manifestations.
- 66. Acute rheumatic fever. Treatment. Primary and secondary prevention.
- 67. Congenital heart diseases. Classification. Diagnosis. General principles of treatment.
- 68. Congenital heart diseases with the left-to-right shunt lesions (acyanotic).
- 69. Congenital heart diseases with the right-to-left shunt lesions (with cyanosis)
- 70. Congenital heart diseases with the obstructive lesions.
- 71. Nonreumathic miocarditis. Etiology. Diagnosis. Principles of treatment.
- 72. Heart failure. Definition. Classifications of pediatric heart failure.
- 73. Left-sided congestive heart failure. Clinical manifestations. Treatment.
- 74. Right-sided congestive heart failure. Clinical manifestations. Treatment.
- 75. Diagnostic approach to heart failure (investigations and laboratory biomarkers).
- 76. Therapeutic approach to pediatric heart failure.
- 77. Juvenile rheumatoid arthritis. Etiology. Clinical manifestations.
- 78. Juvenile rheumatoid arthritis. Treatment
- 79. Definition of «anemia». Classification.
- 80. Iron absorption and metabolism. Stages of iron deficiency.
- 81. Iron deficiency anemia in children. Causes. Clinical signs.
- 82. Iron deficiency anemia in children. Diagnosis. Treatment.
- 83. Iron deficiency anemia in children. Treatment.
- 84. Hemolytic anemia. Classification. Diagnosis.
- 85. Henoch-Schönlein purpura. Pathogenesis. Clinical presentation.
- 86. Henoch-Schönlein purpura. Diagnosis. Treatment.
- 87. Immune thrombocytopenia. Pathogenesis. Clinical presentation.
- 88. Immune thrombocytopenia. Diagnosis. Treatment.
- 89. Hemophilia in children. Pathogenesis. Diagnosis. Treatment.
- 90. Leukemia. Classification. Clinical manifestations.
- 91. Acute lymphoblastic leukemia. Treatment strategy. Prognosis
- 92. Urinary tract infections. Definition. Classification. Management.
- 93. Pyelonephritis. Etiology. Classification. Diagnostic criteria.
- 94. Pyelonephritis. Clinical manifestations in infants and toddlers.
- 95. Pyelonephritis. Clinical manifestations in older children.
- 96. Pyelonephritis. Treatment.
- 97. Glomerulonephritis. Definition. Clinical classification.

- 98. Acute poststreptococcal glomerulonephritis. Etiology. Pathogenesis. Clinical manifestations.
- 99. Acute poststreptococcal glomerulonephritis. Diagnostics. Differential diagnosis. Treatment.
- 100. Chronic glomerulonephritis. Definition. Morphological types.
- 101. Nephrotic syndrome. Diagnostic criteria.
- 102. Minimal change nephrotic syndrome in children. Clinical manifestations. Diagnostics. Differential diagnosis. Treatment.
- 103. Chronic glomerulonephritis with nephritic syndrome. Differential diagnosis.
- 104. Acute kidney injury. Definition. Types. Causes.
- 105. Acute kidney injury in children. p-RIFLE classification.
- 106. Acute kidney injury in children. Clinical features. Laboratory biomarkers.
- 107. Management of acute kidney injury in children. Prognosis.
- 108. Chronic kidney disease in children. Definition. Clinical features. Classification.
- 109. Differential diagnosis of abdominal pain syndrome in children.
- 110. Diagnosis of Helicobacter pylori infection.
- 111. Functional dyspepsia. Types. Clinical manifestations.
- 112. Chronic gastritis. Sydney system for the classification.
- 113. Peptic ulcer in children.
- 114. Helicobacter pylori eradication therapy.
- 115. Functional biliary disorders in children. Classification. Diagnostic criteria.
- 116. Chronic pancreatitis. Clinical manifestations. Diagnosis. Treatment.
- 117. Malnutrition. Types. Criteria for classifications of undernutrition.
- 118. Causes of undernutrition (protein-energy malnutrition).
- 119. Clinical manifestations of undernutrition. Main clinical syndromes.
- 120. Protein-energy malnutrition. Enteral and parenteral nutrition.
- 121. Celiac disease. Clinical manifestations. Diagnosis. Treatment.
- 122. Cystic fibrosis. Etiology. Pathogenesis. Types of clinical manifestations. Diagnostic criteria.
- 123. Cystic fibrosis. Gastrointestinal manifestations. Diagnosis. Treatment.
- 124. Cystic fibrosis. Respiratory manifestations. Diagnosis. Treatment.
- 125. Convulsions and seizures in children. Causes. Acute management of seizures. Post seizure care.
- 126. Fever. Definition. Causes. Management of pediatric patients with fever.
- 127. Congenital hypothyroidism.
- 128.  $\beta$ 2-agonists. Indications for using.
- 129. Leukotriene modifiers. Indications for using.
- 130. Inhaled anticholinergics. Indications for using.
- 131. Antifungal drugs in pediatric practice. Indications for using.
- 132. Anticoagulants. Indications for using.
- 133. Inhaled and systemic glucocorticosteroids. Indications for using.
- 134. Antipyretics in pediatric practice. Indications for using.
- 135. Macrolide antibiotics.
- 136. Antiagregants. Indications for using.
- 137. Diuretics. Indications for using.

- 138. Nonsteroidal anti-inflammatory drugs in pediatric practice. Indications for using.
- 139. Mucolytics. Indications for using.
- 140. Aminoglycosides. Indications for using.
- 141. Penicillins. Indications for using.
- 142. Cephalosporins. Indications for using.
- 143. Anticonvulsants for acute management of pediatric seizures.
- 144. Iron supplements for anemia. Indications for using.
- 145. Anthihistamines. Indications for using.
- 146. Antiviral drugs in pediatric practice. Indications for using.
- 147. Methylxanthines. Indications for using.
- 148. Proton pump inhibitors. Indications for using.
- 149. Histamine H2-receptor antagonists. Indications for using.
- 150. Digestive enzyme supplements and pancreatic enzyme replacement therapy.