JAMMU AND KASHMIR PUBLIC SERVICE COMMISSION
Resham Ghar Colony, Bakshi Nagar, Jammu-180001

Subject: Syllabus for the written test for the post of Medical Officer in Health & Family Welfare Department.

Notice
Dated: 27.03.2017

In continuation to notification no. 01-PSC (DR-P) of 2017 dated: 27.03.2017 whereunder posts of Medical Officer in Health & Family Welfare Department were advertised for inviting applications through online mode, the Commission hereby notifies the syllabus for the said posts for the purpose of the written examination (MCQ type);

Syllabus for Medical Officer

1. General Surgery Including Orthopaedics:
   1. Wound healing
   2. Fluid and electrolytes
   3. Nutritional Support
   4. Wound infection, special infections, AIDS
   5. Sterilization, methods and precautions
   6. Transplantation
   7. Tumors
   8. Skin diseases and Plastic surgery, Burns.
   9. Arterial disorders and venous disorders, Lymphatics
   10. Accident and emergency Surgery
   11. Cleft lip and palate
   12. Disorders of salivary gland
   13. Sutures
   14. Thyroid
   15. Parathyroid and Adrenal glands
   16. Breast
   17. Thorax – Injuries and diseases of Lung, Diaphragm
   18. Heart
   19. Liver
   20. Spleen
   21. Gall bladder and Bile ducts
   22. Pancreas
   23. Peritoneum, Omentum, Mesentery and Retroperitoneal spaces.
   24. Small and large intestine
   25. Intestinal obstruction
   26. Appendix
   27. Rectum
   28. Anus and Anal Canal
   29. Hernias
   30. Urology
   31. Fractures
   32. Tumors of Bone, Benign and Malignant
   33. Metabolic and Non infection disorders of bones and joints.
   34. Infection of Joints, Pyogenic, Tuberculosis
Injuries of spine and pelvis & their management.

2. **Medicine:**
   1. Cardinal manifestations and presentation of diseases.
   2. Genetics.
   3. Nutritional diseases
   4. Hematology
   5. Infectious diseases
   6. Disease of Cardio Vascular system
   7. Diseases of Respiratory system
   8. Diseases of Kidney and Urinary tract
   10. Diseases of Immune system, connective tissue and joints
   11. Endocrinology & Metabolism.

3. **Obstetrics And Gynaecology:**
   1. Introduction to Obstetrics
   2. Development of human placenta and embryo, anomalies of placenta and coord.
   5. Diagnosis of pregnancy
   7. Role of USG and Radiology in Obstetrics.
   8. Antenatal care including use of drugs during pregnancy.
   9. Antepartum, foetal surveillance in high risk pregnancies.
   10. Social Obstetrics
   11. Anemia in pregnancy
   13. Diabetes, prediabetic state, glycoosuria in pregnancy
   15. Psychiatric disorders in pregnancy and purperium
   16. Jaundice in pregnancy
   17. Skin diseases in pregnancy
   18. Urinary Tract infection in pregnancy including Asymptomaticbacteruria, chronic renal infection in pregnancy, renal failure in pregnancy.
   20. APH-placentaprevia accidental haemorrhage and extra placental causeshypofibrinogenemis, diagnosis and management, DUC annuria.
   21. Rh factor Pathology Rh testing and management of pregnancy and new born.
   22. Multiple pregnancy
   23. Postmaturity
   24. Intrauterine growth retardation
   25. Intrauterine death.
   26. Recurrent pregnancy - wastages
   27. Surgical Gynecological conditions with pregnancy
   28. Abnormal position and presentations
   29. Special cases
   30. Normal Labour
   31. Preterm Labour
   32. Abnormal Uterine action
   33. Prolonged labour
   34. Normal Pelvis and foetal skull
   35. Contracted Pelvis, CPD, Pelvic assessment
   36. Obstructed Labour
   37. Injuries of Genital Tract
   38. Injury of the Urinary System
   39. Obstetrical Palsy
   40. Postpartum Collapse.
   41. Normal Pueperium
   42. Puerperal infection
   43. Neonatology
44. Obstetrical procedure.
45. Anatomy of Uro Genital tract
46. Development of Urogenitaltract.
47. Physiology of Menstruation, ovulation and Normal Contro.
48. Gynaecological History taking, examination and investigation.
49. Sex differentiation, asexuality & Intersexuality.
50. Amenorrhoea causes, Diagnosis and Management.
51. Infertility Male & Female causes, Diagnosis with investigation and management with newer modalities.
52. Dysmenorrhoea
53. Abnormal uterine bleeding
54. Abortions.
55. Trophoblastic tumors
56. Ectopic pregnancy
57. Infections of Genital tract.
58. Genital prolapse Retroversion
59. Urinary Incontinence
60. Rectal incontineince
61. Endometriosis and Adenornysis.
62. Benign conditions and benign tumors.
63. Pruritis
64. Chronic Vulval Dystrophies
65. Tumors of Uterus
66. Ovarian Tumors
67. Genital Cancers
68. Menopause
69. Role of USG & Radiology in Gynae
70. Preoperative and postoperative management & complications of major Gynae surgery.
71. Gynaecological surgery
72. MTP 1st and 2nd Trimester
73. Contraceptions including Voluntary surgical contraception.
74. Demography

4. Pediatrics:
1. Basic sciences as applied to paediatrics
2. Growth and development.
3. Adolescence
4. Clinical biostatistics
5. Community paediatrics, including National Programmes.
6. Immunization
7. Nutritional requirements and nutritional disorders.
8. Infectious disease, including parasitic infestations
10. Systemic diseases.
11. Neonatology including antenatal paediatrics.

5. Preventive and Social Medicine:
1. History of Preventive and Social Medicine.
2. Concepts of Health and Diseases.
3. Nutrition and Health
4. Social Science and Health
5. Environment & Health
6. Occupational Health
7. Genetics and Health
8. Public Health Administration
9. Demography and Family Planning
10. Maternal and Child Health
11. Immunity and Immunization
12. Epidemiology of communicable and non-communicable diseases.
14. Health Information systems for the routine and vital health statistics
15. Primary Health care-Principles, components and levels of practice in the health care
16. Health Education
17. International Health.

6. Forensic Medicine & Toxicology:
   1. Medicolegal examination of injured person
   2. Medicolegal examination of Rape victim
   3. Medicolegal examination of Sodomy
   4. Examination of accused of Rape
   5. Medicolegal Examination of Intoxicated person
   6. Procedure for conducting Medicolegal Post-mortem
   7. Essential requirements for conduct of Medicolegal Post-mortem
   8. Autopsy of Focus
   9. To calculate time since death on post-mortem
  10. Examination of Skeletal remains
  11. Technique of Viscera Preservation on post-mortem examination
  12. Exhumation & Post-mortem
  13. Medicolegal duties of Doctor in Poisoned Patients
  14. Duties of a R.M.P
  15. Procedure of recording Evidence
  16. Recording of Firearm injuries
  17. Forensic Science Laboratory
  18. Post-mortem in case of Hanging and strangulation
  19. Age Certification
  20. Medical Jurisprudence
  21. Forensic psychiatry
  22. Thanatology
  23. Deliriant poisons
  24. Fire arm & bomb blast injury

7. Anatomy:
   a. Cardiovascular system and lymphatic system-Blood supply of heart +lymphatic drainage of heart
   b. Thoracic outlet syndrome
   c. Abdominal quadrants
   d. Vermiform appendix-Positions of appendix
   e. Difference between male and female pelvis
   f. Layers of Scalp
   g. Triangles of neck, contents of anterior triangle
   h. Paranasal sinuses with applied anatomy
   i. Cartilages of larynx
   j. Names of Cranial Nerves
   k. Pharyngeal arches
   l. History of cardiac muscles
   m. Difference between thick and thin Skin
   n. Annual pancreas

8. Physiology:
   Nerve Muscles
   a. Neuromuscular transmission
   b. Muscle proteins(Biochemistry)
   c. Excitation-Contraction coupling

   Blood
   a. Anemia
   b. Hemostatis

   Respiratory System
   a. Mechanics of respiration-I
   b. Mechanics of respiration-II

   Cardiovascular System
   a. ECG
   b. Exercise physiology
   c. Cardiovascular reflexes
   d. Special features of circulation in skeletal muscles and skin

   Gastrointestinal System
   a. Introduction of G.I. Physiology: General organization of G.I. tract
   b. Pathophysiology of diarrheal disease
Nutrition
a. Diet during pregnancy and lactation
b. Diet during infancy and childhood

Environmental Physiology
a. Man in cold environment
b. Man in hot environment

Reproduction
a. Introduction to reproductive system

Kidney
a. Renal Tubular function-I
b. Renal Tubular function-II
c. Micturition

General
a. CSF
b. Physiology of pain
c. Brain stem reflexes, stretch reflexes and tendon reflexes
d. Basal ganglia
e. Speech
f. Functional anatomy of eye
g. Functional anatomy of ear: impedance matching
h. Auditory pathway
i. Olfaction
j. Physiology of taste

9. Biochemistry:

a. Molecular Biology-its role in Clinical Biochemistry
   Structure, biochemical role of DNA and RNA, Genomes, Basic concepts of DNA & RNA metabolism Replication, Transcription and Translation-importance of their inhibitors, Recombinant DNA technology and polymerase chain reaction-their role in medicine, Genetic therapy, Genomics and Bioinformatics, their relevance to medicine.

b. Biochemical basis of Hormone action
   Communication among cells and tissues, Molecular mechanism of action of Steroid hormones, hormones of pancreas, thyroid and parathyroid, Signal transduction, G-Proteins coupled receptors and second messengers, Role of leptins and adipocytokines.

c. Clinical Biochemistry
   Organ function tests: Liver function tests, Kidney function tests, Thyroid function tests, Adrenal and Pancreatic function tests, Tumor markers and growth factors, Biochemical changes in pregnancy and lactation, Water and electrolytes balance and imbalance, Acid-base balance and disorders. Total Quality Management of Laboratories, Internal quality control, External quality control, Accreditation of laboratories.

10. Microbiology:

a. General Bacteriology
   i. Sterilization/disinfection
   ii. Culture media
   iii. Antimicrobial sensitivity
   iv. Bacterial genetics

b. System Bacteriology
   i. Gram positive bacteria
   ii. Gram Negative bacteria
   iii. Mycobacteria

c. Immunology
   i. Innate and Adaptive immune responses
   ii. Hypersensitivity
   iii. Autoimmunity

d. Virology
   i. DNA/RNA viruses
   ii. HIV
   iii. Herpes viruses

11. Pharmacology:
12. ENT:
1. Complications of Otitis media
2. Otosclerosis and tympanoplasty
3. BERA
4. Acoustic neuroma (tumors of ear)
5. FESS/ESS
6. Neurological affections of larynx
7. Hoarseness and tumors
8. Tracheostomy
9. Diseases and tumors of thyroid
10. ENT manifestation of AIDS

13. Ophthalmology:

1 Lids:
   I. Entropeon
   II. Ectropeon
   III. Ptosis

2. Cornea
   I. Corneal ulcer
   II. Keretoconus
   III. Lasik laser

3. Lens
   I. Senile cataract
   II. Subluxated lens
   III. Multifocal iol

4. Retina
   I. Diabetic Retinopathy
   II. Macular hole
   III. Retinal detachment

5. Optic nerve
   I. Optic atrophy
   II. Pappiledema
   III. Dilated pupil

14. Radiology:
   I. Radiation Protection and hazards
   II. Basics of x-ray, ultrasound, CT and MRI
   III. Basics of PET & SPECT
   IV. Clinical indications/contraindications of CT, MRI and PET
   V. Contrast media and their adverse reactions and their management
   VI. Radiological investigations like IVP, HSG, Barium studies
   VII. Ultrasonography and Doppler.
6. In-Charge Camp Office, Srinagar.
8. Main file/Programme file.