

DO NOT OPEN THIS TEST BOOKLET UNTIL YOU ARE ASKED TO DO SO

Test Booklet Series

T. B. C. : AP – 4 – 17/18

A

TEST BOOKLET
ASSISTANT PROFESSOR IN O.M.E.S. SI. No.
(COMMUNITY MEDICINE)

1181

Time Allowed : 3 Hours

Maximum Marks : 200

: INSTRUCTIONS TO CANDIDATES :

1. IMMEDIATELY AFTER THE COMMENCEMENT OF THE EXAMINATION, YOU SHOULD CHECK THAT THIS TEST BOOKLET DOES NOT HAVE ANY UNPRINTED OR TORN OR MISSING PAGES OR ITEMS ETC. IF SO, GET IT REPLACED BY A COMPLETE TEST BOOKLET OF THE SAME SERIES ISSUED TO YOU.
2. ENCODE CLEARLY THE TEST BOOKLET SERIES A, B, C OR D, AS THE CASE MAY BE, IN THE APPROPRIATE PLACE IN THE ANSWER SHEET USING BALL POINT PEN (BLUE OR BLACK).
3. You have to enter your **Roll No.** on the Test Booklet in the Box provided alongside. **DO NOT** write anything else on the Test Booklet.
4. **YOU ARE REQUIRED TO FILL UP & DARKEN ROLL NO., TEST BOOKLET / QUESTION BOOKLET SERIES IN THE ANSWER SHEET AS WELL AS FILL UP TEST BOOKLET / QUESTION BOOKLET SERIES AND SERIAL NO. AND ANSWER SHEET SERIAL NO. IN THE ATTENDANCE SHEET CAREFULLY. WRONGLY FILLED UP ANSWER SHEETS ARE LIABLE FOR REJECTION AT THE RISK OF THE CANDIDATE.**
5. This Test Booklet contains **200** items (questions). Each item (question) comprises four responses (answers). You have to select the correct response (answer) which you want to mark (darken) on the Answer Sheet. In case, you feel that there is more than one correct response (answer), you should mark (darken) the response (answer) which you consider the best. In any case, choose **ONLY ONE** response (answer) for each item (question).
6. You have to mark (darken) all your responses (answers) **ONLY** on the **separate Answer Sheet** provided by using **BALL POINT PEN (BLUE OR BLACK)**. See instructions in the Answer Sheet.
7. All items (questions) carry equal marks. All items (questions) are compulsory. Your total marks will depend only on the number of correct responses (answers) marked by you in the Answer Sheet. **There will be no negative markings for wrong answers.**
8. Before you proceed to mark (darken) in the Answer Sheet the responses to various items (questions) in the Test Booklet, you have to fill in some particulars in the Answer Sheet as per the instructions sent to you with your **Admission Certificate**.
9. After you have completed filling in all your responses (answers) on the Answer Sheet and after conclusion of the examination, you should hand over to the Invigilator the **Answer Sheet** issued to you. You are allowed to take with you the candidate's copy / second page of the Answer Sheet along with the **Test Booklet**, after completion of the examination, for your reference.
10. Sheets for rough work are appended in the Test Booklet at the end.

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SEAL

1. An example for toxoid is :
 - (A) Rabies
 - (B) Diphtheria
 - (C) Pertussis
 - (D) Measles
2. Vaccine which must be stored in the freezer compartment includes :
 - (A) Polio
 - (B) BCG
 - (C) DPT
 - (D) All of the above
3. In India, Universal Immunization Programme was launched in the year :
 - (A) 1978
 - (B) 1985
 - (C) 1992
 - (D) 1997
4. The disease subject to International Health Regulation includes :
 - (A) Polio
 - (B) Malaria
 - (C) Viral influenza
 - (D) Plague
5. Brucella abortus infects primarily :
 - (A) Goat
 - (B) Sheep
 - (C) Cattle
 - (D) Pig
6. Case fatality rate in Japanese Encephalitis is :
 - (A) < 10%
 - (B) 10 – 20%
 - (C) 20 – 40%
 - (D) 40 – 60%
7. Chikungunya fever is transmitted by :
 - (A) Aedes
 - (B) Culex
 - (C) Mansonia
 - (D) All of the above
8. About 60 – 80% of all reported cases of foodborne diseases are due to :
 - (A) Staphylococcus aureus
 - (B) Salmonella
 - (C) Clostridium Perfringens
 - (D) Bacillus cereus
9. Amplifying host for the virus in Kyasanur Forest Disease is :
 - (A) Pig
 - (B) Monkey
 - (C) Cattle
 - (D) Man
10. Gomez classification is based on retardation of :
 - (A) Weight
 - (B) Height
 - (C) Both Height and Weight
 - (D) All of the above

11. Minimum iodine content of salt required at consumer level is :
 - (A) 10 ppm
 - (B) 15 ppm
 - (C) 30 ppm
 - (D) 40 ppm
12. The risk of stomach cancer has been related to the deficiency of :
 - (A) Vitamin C
 - (B) Vitamin D
 - (C) Cobalt
 - (D) Nickel
13. Prevention of Food Adulteration Act enacted by the Indian Parliament in the year :
 - (A) 1954
 - (B) 1977
 - (C) 1985
 - (D) 1997
14. According to Dietary Goals, salt intake per day should be reduced to an average of not more than :
 - (A) 5 grams
 - (B) 10 grams
 - (C) 15 grams
 - (D) 20 grams
15. An example for second generation Intra Uterine Device is :
 - (A) Lippes loop
 - (B) T-Cu-380A
 - (C) Progestasert
 - (D) Levonorgestrel
16. The commonest complaint of women fitted with an Intra Uterine Device is :
 - (A) Vaginal Bleeding
 - (B) Pain
 - (C) Pelvic infection
 - (D) Uterine perforation
17. An absolute contraindication for Oral Contraceptive Pill use is :
 - (A) Age over 40 years
 - (B) Mild hypertension
 - (C) Epilepsy
 - (D) Cancer of the breast
18. Norplant is an example of :
 - (A) Subdermal implant
 - (B) Vaginal ring
 - (C) First generation IUD
 - (D) Second generation IUD
19. The Medical Termination of Pregnancy Act was enacted in the year :
 - (A) 1975
 - (B) 1971
 - (C) 1983
 - (D) 1997

20. Scope of family planning services includes :
- (A) Advice on sterility
 - (B) The proper spacing and limitation of births
 - (C) Education on parenthood
 - (D) All of the above
21. Net Reproduction Rate of 1 can be achieved only if the Couple Protection Rate exceeds :
- (A) 40%
 - (B) 50%
 - (C) 60%
 - (D) 70%
22. An example for Post-conceptual method is :
- (A) Menstrual induction
 - (B) Subdermal implants
 - (C) Vaginal rings
 - (D) Injectable contraceptives
23. Rickettsial pox is transmitted by insect vector :
- (A) Louse
 - (B) Flea
 - (C) Tick
 - (D) Mite
24. Average incubation period of rubella is :
- (A) 10 days
 - (B) 14 days
 - (C) 18 days
 - (D) 21 days
25. After how many days does Immunity in measles vaccination develop ?
- (A) 2 days
 - (B) 4 days
 - (C) 8 days
 - (D) 12 days
26. How many types of vaccines are available against Japanese Encephalitis ?
- (A) 1
 - (B) 2
 - (C) 3
 - (D) 4
27. All of the following are elements of primary health care **EXCEPT** :
- (A) Immunization against major infectious diseases
 - (B) Provision of essential drugs
 - (C) Prevention and control of locally endemic diseases
 - (D) None of the above

28. According to Millennium Development Goals in India, target to reduce under-five mortality between 1990 and 2015 is :
- 1/3
 - 2/3
 - 1/4
 - 1/2
29. At village level, primary health care is provided by all **EXCEPT** :
- ASHA
 - Anganawadi worker
 - Local dais
 - Multipurpose worker (Male health worker)
30. Population covered by one sub-centre in general is :
- 1,000
 - 5,000
 - 10,000
 - 25,000
31. The trace element which plays a role in insulin function is :
- Copper
 - Cobalt
 - Chromium
 - Selenium
32. Daily requirement of calcium for an adult man is :
- 300mg
 - 600mg
 - 400mg
 - 800mg
33. The protein of maize is deficient in the amino acid :
- Tryptophan
 - Leucine
 - Tryptophan and Lysine
 - Lysine
34. Proximate principles includes all **EXCEPT** :
- Proteins
 - Fats
 - Carbohydrates
 - Vitamins
35. Daily requirement of Vitamin C for an adult man is :
- 40mg
 - 60mg
 - 80mg
 - 150mg
36. The WHO cut off points for the diagnosis of anaemia in pregnant adult females :
- 10gm%
 - 11gm%
 - 12gm%
 - 13gm%

37. Milk from which fat has been removed is known as :
- (A) Skimmed milk
 - (B) Toned milk
 - (C) Diluted milk
 - (D) Protein milk
38. Lathyrism is due to toxin :
- (A) BOAA
 - (B) Sanguinarine
 - (C) Aflatoxin
 - (D) Pyrrolizidine alkaloids
39. ICDS programme is under the Ministry of :
- (A) Health and Family Welfare
 - (B) Social Welfare
 - (C) Education
 - (D) Rural Development
40. The statistical test to compare mean systolic blood pressure amongst 2 groups is :
- (A) Student t test
 - (B) McNemar test
 - (C) Fischer test
 - (D) Chi-square test
41. If the cut off point in the interpretation of a test is raised, one of the following may occur :
- (A) Sensitivity decreases and specificity increases
 - (B) Sensitivity increases and specificity decreases
 - (C) Sensitivity increases and specificity increases
 - (D) Sensitivity decreases and specificity decreases
42. Classical triad of congenital rubella syndrome includes all except :
- (A) PDA
 - (B) Deafness
 - (C) Microcephalus
 - (D) Cataract
43. Which is the most sensitive indicator of recent faecal contamination of drinking water ?
- (A) E. Coli
 - (B) Cl. perfringens
 - (C) Streptococci
 - (D) Klebsiella
44. The most reliable indicator of thermal comfort is :
- (A) Effective temperature
 - (B) McAradle's sweat rate
 - (C) Corrected effective temperature
 - (D) Cooling power

45. "Delphi method" is used :
- (A) For calculating pearl index
 - (B) For forming consensus
 - (C) For calculating sample size
 - (D) As a teaching-learning tool
46. Ergonomics is concerned with :
- (A) Improving the genetic endowment of human population
 - (B) Fitting the job to the worker
 - (C) Environmental manipulation according to human needs
 - (D) Improving the agricultural production
47. The WHO Theme for the year 2016 is :
- (A) Aging and health
 - (B) Diabetes
 - (C) Antimicrobial resistance
 - (D) Food safety
48. The following statements about breast milk are true, **EXCEPT** :
- (A) The maximum milk output is seen at 12 months
 - (B) The coefficient of uptake of iron in breast milk is 70%
 - (C) Calcium absorption of human milk is better than that of cow's milk
 - (D) It provides about 65 Kcals per 100 ml
49. In a community of population 10,000 with a birth rate of 36 per 1000, five maternal deaths were reported in a year. The Maternal Mortality Rate in that community is :
- (A) 14.5
 - (B) 13.8
 - (C) 20.0
 - (D) 5.0
50. Intra-observer variation can be minimized by :
- (A) Taking average of several measurements at the same time
 - (B) Standardization of procedures for obtaining measurements
 - (C) Intensive training of observers
 - (D) Repeated measurements over time
51. A study among 400 adolescent girls in a PHC found that the mean Hb was 11 g%. If the standard deviation was 4 g%, the 95% Confidence Interval for mean Hb is :
- (A) 7.0 to 15.0
 - (B) 9.0 to 13.0
 - (C) 10.6 to 11.4
 - (D) 10.8 to 11.2

52. Which one of the following statement is **FALSE** with respect to IDSP ?
- (A) A syndromic diagnosis is made by the Medical Officer
 - (B) Confirmed diagnosis is made based on history, examination and laboratory investigation
 - (C) Sub-centre health work also reports clinical syndromes from private clinics / hospitals
 - (D) Non-communicable diseases are also surveyed under IDSP
53. Verbal autopsy is used in :
- (A) Census
 - (B) Sample registration system
 - (C) Civil registration system
 - (D) National family welfare health survey
54. A punched out ulcer covered with blackened scab eschar is a typical feature of :
- (A) Scrub typhus
 - (B) Murine typhus
 - (C) Q fever
 - (D) Epidemic typhus
55. An ideal mosquito net should contain _____ number of holes in one square inch.
- (A) 75
 - (B) 100
 - (C) 125
 - (D) 150
56. Chandler's index is meant for :
- (A) Filariasis
 - (B) Guinea worm
 - (C) Round worm
 - (D) Ankylostoma
57. The response graded by an observer on an "agree-disagree" continuum is based on :
- (A) Visual analog scale
 - (B) Guttman scale
 - (C) Adjectival scale
 - (D) Likert scale
58. In a randomized clinical trial, the essential purpose of randomization is to :
- (A) Produce double blinding
 - (B) Decrease the follow-up period
 - (C) Decrease the sample size
 - (D) Eliminate the selection bias
59. If the prevalence of a disease is expected to be 50%, an investigator wants to measure the prevalence in the range of 45 to 55% with 95% confidence. The minimum sample size required for the study will be :
- (A) 100
 - (B) 200
 - (C) 300
 - (D) 400

60. Pneumoconiosis occurs as a result of inhalation to the dust of size :
- (A) 0.5 to 3 μ
 - (B) 0.2 to 0.5 μ
 - (C) 3 to 5 μ
 - (D) 5 to 8 μ
61. The referral date for Indian Census 2011 was :
- (A) 1st April, 2011
 - (B) 1st February, 2011
 - (C) 1st March, 2011
 - (D) 1st April, 2010
62. Kappa coefficient is a procedure which can be used to :
- (A) Assess the validity of answers given by a group of patients
 - (B) Assess the agreement as regards responses to two different sources
 - (C) Assess the correlation between blood pressure readings taken on the same patients by two different nurses
 - (D) Adjust for confounding at analysis stage
63. Most likely reason for failure to establish a cause-effect relationship with small sample sizes is :
- (A) Alpha error or Type I error
 - (B) Beta error or Type II error
 - (C) Measurement errors
 - (D) Observer errors
64. Latent period + period of maximum communicability will give crude estimate of the :
- (A) Lead time
 - (B) Lag time
 - (C) Generation time
 - (D) Incubation period
65. A large amount of subclinical infection occurs in all of the following diseases **EXCEPT** :
- (A) Hepatitis A
 - (B) Hepatitis B
 - (C) Rubella
 - (D) Measles
66. Serum should be separated from blood prior to transportation if the time taken to reach the laboratory is :
- (A) > 6 hours
 - (B) > 12 hours
 - (C) > 18 hours
 - (D) > 24 hours

67. Most commonly reported Rickettsial infection in India is :
 (A) Scrub typhus
 (B) Indian Tick Typhus
 (C) Epidemic typhus
 (D) Rickettsial pox
68. A Specific Flea Index greater than _____ for *Xenopsylla cheopis* on rats represents a potentially dangerous situation.
 (A) 1
 (B) 2
 (C) 3
 (D) 4
69. Humans are :
 (A) Dead end host for *Leptospire*s
 (B) Intermediate host for *Leptospire*s
 (C) Amplifying host for *Leptospire*s
 (D) Cyclo-propagative host for *leptospire*s
70. In normally used doses, chlorination does not affect :
 (A) *Salmonella*
 (B) Polio
 (C) *Shigella*
 (D) HIV
71. Pasteurization destroys :
 (A) All pathogenic organisms only
 (B) All organisms
 (C) Some pathogenic organism
 (D) Most pathogenic organisms
72. The highest content of niacin is present in :
 (A) Jaggery
 (B) Groundnuts
 (C) Pistachio
 (D) Milk
73. A teacher will be classified as a :
 (A) Sedentary worker
 (B) Moderate worker
 (C) Heavy worker
 (D) Average worker
74. A "safety margin" of + 2 SD is not incorporated for the RDA of :
 (A) Energy
 (B) Fats
 (C) Water soluble vitamins
 (D) Fat soluble vitamins
75. A 16 years old girl sustains a clean, non-penetrating wound, with negligible tissue damage reports within 6 hours. She is fully vaccinated as per the immunization schedule. After wound toileting what should be done with regards to TT immunization :
 (A) Nothing more required
 (B) One dose of tetanus toxoid to be given
 (C) Two dose of tetanus toxoid to be given
 (D) One dose of tetanus toxoid with human tetanus immunoglobulin is needed

76. A form of economic analysis which compares relative costs and outcomes (effects) of two or more programs is called :
- (A) Cost effective analysis
 - (B) Cost benefit analysis
 - (C) Cost utility analysis
 - (D) Cost accounting
77. The mean corpuscular haemoglobin concentration in all ages should be :
- (A) 30%
 - (B) 32%
 - (C) 34%
 - (D) 36%
78. A 3 year old child had diarrhoea for 8 days. On examination the child was irritable, eyes were sunken and skin pinch goes back slowly. According to IMNCI guidelines, the child has diarrhoea with :
- (A) No dehydration
 - (B) Some dehydration
 - (C) Severe dehydration
 - (D) Very severe dehydration
79. Which one of the following is TRUE about Multi Drug Treatment (MDT) for Leprosy ?
- (A) Safe during pregnancy
 - (B) Contraindicated in patients with HIV infection
 - (C) Includes rifampicin, dapson, clofazimine for paucibacillary leprosy
 - (D) Should be stopped if the patient develops severe type 2 lepra reaction
80. Human Developmental Index includes all EXCEPT :
- (A) Adult literacy
 - (B) Per capita income
 - (C) Life expectancy
 - (D) Infant mortality rate
81. The first step in the investigation of a disease outbreak is :
- (A) Confirmation of the existence of an epidemic
 - (B) Delineation of the population affected
 - (C) Verification of the diagnosis
 - (D) Preparing a spot map of the area

82. If the prevalence of a disease is 10% and the sensitivity of a screening test is 90% with a specificity of 70%, the positive predictive value of the test is :
- (A) 25%
 - (B) 50%
 - (C) 80%
 - (D) 90%
83. The acronym MPOWER is related to :
- (A) Diabetes
 - (B) Alcohol
 - (C) Tobacco
 - (D) CVD
84. Socially acquired learned behaviour is called :
- (A) Socialization
 - (B) Custom
 - (C) Culture
 - (D) Acculturation
85. Statistical power of a trial is equal to :
- (A) $1 + \alpha$
 - (B) $1 - \alpha$
 - (C) $1 + \beta$
 - (D) $1 - \beta$
86. What will be the minimum sample size required to study a parameter whose prevalence from previous studies is 25% after having assumed a alpha error of 5% with a relative precision of 10% ?
- (A) 300
 - (B) 600
 - (C) 1000
 - (D) 12000
87. The reservoir for tetanus bacilli is :
- (A) Soil
 - (B) Man
 - (C) Faeces
 - (D) Both man and soil
88. Which one of the following is not a part of the triple bottom line approach in sustainable development goals ?
- (A) Economic development
 - (B) Environmental sustainability
 - (C) Social inclusion
 - (D) Community participation
89. If a friend of yours would like to test two interventions but has limited resources and wants a RCT design that will help test both interventions with controls at the same time, which of the following design would you suggest to him ?
- (A) Classical RCT
 - (B) Parallel design
 - (C) Factorial design
 - (D) Cross over design

90. An absolute contraindication to kill vaccine is :
- (A) Pregnancy
 - (B) Lymphoma
 - (C) Reaction to previous dose
 - (D) Immunodeficiency
91. Which of the following is a form of economic analysis in which two activities are compared in terms of their costs and the relative degree to which they obtain the desired objectives ?
- (A) Cost utility analysis
 - (B) Cost benefit analysis
 - (C) Cost effectiveness analysis
 - (D) Cost minimization analysis
92. Duration of period of quarantine is :
- (A) Shortest incubation period
 - (B) Longest incubation period
 - (C) Mean of longest and shortest incubation period
 - (D) Period of infectivity
93. In a study you find that the OR for association of X with Y was 1.5. When you stratified based on variable Z you found that the OR in the two sub groups was 1.8 and 1.2. What would you conclude about Z ?
- (A) Variable Z is a source of bias in the study
 - (B) Variable Z is a confounder
 - (C) Variable Z is an affect modifier
 - (D) Variable Z is just a random variable
94. Which of the following is NOT one of the building blocks in the health system framework ?
- (A) Service delivery
 - (B) Health workforce
 - (C) Financial risk protection
 - (D) Leadership and governance
95. The likelihood of causal relationship increases by :
- (A) Temporal association
 - (B) Strength of association
 - (C) Biological plausibility
 - (D) All of the above
96. Welder's flash is due to exposure to :
- (A) Ionizing radiation
 - (B) Ultraviolet radiation
 - (C) Bright illumination
 - (D) Poor illumination

97. An investigator wishes to perform a RCT to evaluate a new beta blocker as treatment of hypertension. To be eligible for the study, subjects must have a resting diastolic blood pressure (DBP) of at least 90 mmHg. One hundred patients seen at the screening with this level of hypertension are recruited for the study. When their blood pressure was measured two weeks later, only 65 of them have DBP of 90 mmHg or more. The most likely explanation for this is :
- (A) Spontaneous resolution
 - (B) Regression to the mean
 - (C) Baseline drift
 - (D) Measurement error
98. The disease agent undergoes development changes but no multiplication in :
- (A) Plague bacilli in rat flea
 - (B) Malaria parasite in mosquito
 - (C) Microfilaria in mosquito
 - (D) All of the above
99. Which of the following is **NOT** one of the health promotion action measures under the Ottawa charter of 1986 ?
- (A) Build Healthy Public Legislation
 - (B) Create Supportive Environments
 - (C) Strengthen Community Actions
 - (D) Develop Personal Skills
100. In Japanese Encephalitis, the amplifier hosts are :
- (A) Pigs
 - (B) Birds
 - (C) Man
 - (D) Mosquitoes
101. Among women aged 18 to 34 years in a community, weight is normally distributed with a mean of 52 kg and a standard deviation of 7.5 kg. What percentage of women will have a weight over 59.5 kg ?
- (A) 2
 - (B) 5
 - (C) 16
 - (D) 32
102. A plotting device used in meta-analysis to detect publication bias :
- (A) Funnel plot
 - (B) Forest plot
 - (C) Scatter plot
 - (D) Scree plot

103. Compared to human milk, cow's milk has a higher content of :
- (A) Tryptophan and cysteine
 - (B) Vitamin C
 - (C) Fat
 - (D) Lactose
104. The time interval between infection and maximal infectivity is called :
- (A) Incubation period
 - (B) Serial interval
 - (C) Generation time
 - (D) Latent period
105. The size of dust particle inhaled directly into the lungs is :
- (A) < 5 microns
 - (B) 5 – 10 microns
 - (C) 10 – 15 microns
 - (D) 15 – 20 microns
106. What is meant by "treatment after default" ?
- (A) Treatment taken for at least 2 months, discontinued for 2 months and sputum positive at present
 - (B) Treatment taken for at least 2 months, discontinued for 1 month and sputum negative at present
 - (C) Treatment taken for at least 1 month, discontinued for 2 months and sputum negative at present
 - (D) Treatment taken for at least 1 month, discontinued for 2 months and sputum positive at present
107. Which one of the following is **NOT** a second line oral anti-TB drug ?
- (A) Ethionamide
 - (B) Amikacin
 - (C) Para-amino salicylic acid
 - (D) Cycloserine
108. A 14 months old completely unimmunized child has come to the PHC. Which of the following vaccine(s) administration will be ideal ?
- (A) Only BCG
 - (B) BCG, Pentavalent-1, OPV-1
 - (C) Pentavalent-1, OPV-1, Measles
 - (D) BCG, Pentavalent-1, OPV-1, Measles

109. A known 40 years old diabetic patient on OHA is adhering with treatment and has controlled blood sugar levels. As per the ICMR guidelines, at what frequency will you advice the patient to undergo FBS and PPBS testing ?
- (A) Every month
 - (B) Every 2 months
 - (C) Every 3 months
 - (D) Every 6 months
110. A 1 year old child was brought to the PHC with complaints of fever. On examination, the child had respiratory rate of 65/min with NO chest in-drawing. No danger signs were present. How will you classify the child ?
- (A) No pneumonia
 - (B) Pneumonia
 - (C) Severe pneumonia
 - (D) Very severe pneumonia
111. A researcher wants to compare out of pocket expenditure (in rupees) among three groups-children, reproductive women and elderly. The expenditure is not following normal distribution. Appropriate statistical test is :
- (A) Wilcoxon Rank Sum Test
 - (B) Kruskal Wallis Test
 - (C) McNemar Chi-square Test
 - (D) ANOVA
112. Children were assessed for malnutrition and categorized as normal, moderate and severe under-nutrition. Risk factors for malnutrition were assessed. Which type of adjusted analysis will be preferred to identify risk factors ?
- (A) Linear regression
 - (B) Binary logistic regression
 - (C) Ordinal logistic regression
 - (D) Conditional logistic regression
113. Neyman bias is :
- (A) Social desirability bias
 - (B) Ascertainment bias
 - (C) Rumination bias
 - (D) Incidence-prevalence bias
114. As per MOHFW guidelines on deworming, if the prevalence of soil transmitted Helminthes is 60%, deworming strategy to be followed is :
- (A) Preschool and school children at least twice in a year
 - (B) Preschool and school children at least once in a year
 - (C) Preschool, school children and pregnant women twice in a year
 - (D) Mass deworming twice in a year

115. Directly Observed Therapy is followed in treatment of :
- (A) Visceral Leishmaniasis
 - (B) Leptospirosis
 - (C) Filariasis
 - (D) None of the above
116. All are methods of adjusting confounders **EXCEPT** :
- (A) Stratified analysis
 - (B) Multivariate analysis
 - (C) Matching
 - (D) Sensitivity analysis
117. Jai Vigyan Mission Mode is a project related to :
- (A) Screening for refractive errors in school children
 - (B) Screening for Human Papilloma Virus infection among adolescents
 - (C) Rheumatic Heart disease
 - (D) Soil Transmitted Helminths (STH)
118. Information on health infrastructure, health manpower are primarily reported in :
- (A) National Health Accounts
 - (B) National Family Health Survey
 - (C) National Rural Health Statistics
 - (D) Census
119. Which of the following is **NOT** a neglected tropical disease ?
- (A) Tuberculosis
 - (B) Dengue
 - (C) Rabies
 - (D) Scrub typhus
120. Criteria to discontinue Mass Drug Administration (MDA) for Filariasis control is :
- (A) Five annual rounds of MDA are completed
 - (B) No new case of Filariasis detected in the previous year
 - (C) 2% prevalence of microfilariae in community surveys
 - (D) No antigenemia in children aged 2-5 years
121. Active immunity cannot be acquired by:
- (A) Exposure to infectious disease
 - (B) Inoculation with liver of killed vaccine
 - (C) Inoculation with toxoids
 - (D) Inoculation with immune serum
122. Herd immunity does not protect an individual against :
- (A) Diphtheria
 - (B) Poliomyelitis
 - (C) Measles
 - (D) Tetanus

123. The vaccine which is contraindicated during pregnancy is :
- (A) Typhoid vaccine
 - (B) Oral polio vaccine
 - (C) Cholera vaccine
 - (D) Meningococcal vaccine
124. An absolute contraindication to kill vaccine is :
- (A) Pregnancy
 - (B) Lymphoma
 - (C) Reaction to previous dose
 - (D) Immunodeficiency
125. Vaccine prepared from two or more strains of same species is called :
- (A) Autogenous
 - (B) Combined
 - (C) Polyvalent
 - (D) Attenuated
126. All the following vaccines must be stored in the freezer compartment, **EXCEPT** :
- (A) Polio
 - (B) Measles
 - (C) BCG
 - (D) Tetanus toxoid
127. All of the following diseases are notifiable under International Health Regulation, **EXCEPT** :
- (A) Cholera
 - (B) Plague
 - (C) Yellow fever
 - (D) Japanese encephalitis
128. Duration of period of quarantine is :
- (A) Shortest incubation period
 - (B) Longest incubation period
 - (C) Mean of longest and shortest incubation period
 - (D) Period of infectivity
129. Health Surveillance is :
- (A) Collection of data
 - (B) Interpretation of data
 - (C) Monitoring program
 - (D) Continuous scrutiny
130. Linen is ideally sterilized by :
- (A) Boiling
 - (B) Autoclaving
 - (C) Use of chemicals
 - (D) Gamma irradiation
131. In an epidemic situation the first step will be to :
- (A) Identify the population of at risk
 - (B) Confirmation of existence of an epidemic
 - (C) Confirm the diagnosis
 - (D) Evaluation of ecological factors

132. The best method to study the incidence of diarrhea in a community is :
- (A) Cross-sectional study
 - (B) Cohort study
 - (C) Case control study
 - (D) Double blind placebo study
133. A study shows that carcinoma cervix was 5 times more common in those who had multiple sexual partners than in those with single partners. The attributable risk of exposure is :
- (A) 20%
 - (B) 40%
 - (C) 80%
 - (D) 5%
134. Carriers are more dangerous than cases because they :
- (A) Increase virulence
 - (B) Increase duration of disease
 - (C) Infect more people
 - (D) Are more infections
135. The time required for 50% of cases to occur following exposure is :
- (A) Median incubation period
 - (B) Mean incubation period
 - (C) Minimum incubation period
 - (D) Average incubation period
136. In an outbreak of cholera in a village of 2000 population 20 cases have occurred and 5 have died. The case fatality rate is :
- (A) 1%
 - (B) 0.25%
 - (C) 5%
 - (D) 25%
137. Number of deaths in people above 50 years as a percentage of total deaths of all age groups is :
- (A) Expectancy of life
 - (B) Proportional mortality ratio
 - (C) Mortality by cause
 - (D) Crude death rate
138. Which of the following indicated severity of illness ?
- (A) Case fatality rate
 - (B) Prevalence rate
 - (C) Proportional mortality rate
 - (D) Incidence rate
139. Community intervention studies are :
- (A) Cohort study
 - (B) Cross-sectional study
 - (C) Field trials
 - (D) Correlation study

140. Seasonal variation of the disease can be assessed by :
- (A) Comparing incidence of disease
 - (B) Comparing prevalence of disease
 - (C) Using mortality rates
 - (D) Using survival rates
141. Analytical studies are undertaken to :
- (A) Determine the occurrence and distribution of disease
 - (B) Screening of new cases in the community
 - (C) Test the etiological hypothesis
 - (D) None of the above
142. Confounding bias in a case control study can be removed by :
- (A) Double blinding
 - (B) By properly recalling events
 - (C) Matching
 - (D) By selecting representative population
143. A study is called "double blind" when :
- (A) The subjects know they belong to the control group
 - (B) The investigators do not understand the pathology of condition
 - (C) No one knows of the group allocation and treatment received
 - (D) All of the above
144. The likelihood of causal relationship increase by :
- (A) Temporal association
 - (B) Strength of association
 - (C) Biological plausibility
 - (D) All of the above
145. An agent with low pathogenicity and high infectivity would result in development of :
- (A) Carrier
 - (B) Clinical case
 - (C) Epidemic
 - (D) Pandemic
146. An example of cyclopropagative transmission in :
- (A) Plague bacilli in rat flea
 - (B) Malarial parasite in mosquito
 - (C) Microfilaria in mosquito
 - (D) Guinea worm embryo in Cyclops
147. Interval between onset of primary and secondary case is called :
- (A) Latent period
 - (B) Serial interval
 - (C) Generation time
 - (D) Incubation period

148. Interval between receipt of infection by a host and maximal infectivity is :

- (A) Average incubation period
- (B) Generation time
- (C) Latent period
- (D) Communicable period

149. Secondary attack rate reflects :

- (A) Severity
- (B) Communicability
- (C) Fatality
- (D) Infectivity

150. An area is declared free of epidemic after :

- (A) The last secondary case recovers
- (B) No case reported within one incubation period of the disease
- (C) No new case reported within twice the incubation period of disease
- (D) No new case reported for six months since the last case

151. In population of 2000, totally 10 were found to be affected with a particular disease. If the disease lasts for 2 years, the prevalence is :

- (A) 20/1000
- (B) 30/1000
- (C) 10/1000
- (D) 50/1000

152. Patients admitted to hospital with myocardial infarction were questioned about their egg consumption. A group of age and sex matched patients admitted to a fracture clinic were also questioned about their egg consumption. This is a :

- (A) Cross-sectional study
- (B) Cohort study
- (C) Case control study
- (D) Double blind placebo study

153. Calculate the Relative Risk from the following data :

Lung Cancer		
	Positive	Negative
Smoking present	40	990
Smoking absent	2	1028

- (A) 1
- (B) 5
- (C) 10
- (D) 20

154. In carcinoma cervix is 5 times more common in those with multiple sexual partners, the attributable risk of exposure is :

- (A) 20%
- (B) 40%
- (C) 80%
- (D) 5%

155. The study where population is the unit of study is :

- (A) Cross-sectional
- (B) Ecological
- (C) Case-control
- (D) Cohort

156. The number of malaria cases reported during the last 10 years in a town is as follows : 250, 320, 190, 300, 5000, 100, 260, 350, 320 and 160. The appropriate measure of average for this data will be :

- (A) Arithmetic mean
- (B) Mode
- (C) Median
- (D) Geometric mean

157. A concept directed against prevention of risk factors of coronary artery disease is :

- (A) Primordial Prevention
- (B) Secondary Prevention
- (C) Health Education
- (D) Primary Prevention

158. A person was completely immunization against Tetanus 10 years 10 years ago, now presents with a clean wound sustained 2.5 hours ago. He should be given :

- (A) Full course of Tetanus toxoid

- (B) Single dose of Tetanus toxoid
- (C) Human tetanus globulin
- (D) Human tetanus globulin and single dose of toxoid

159. A chest symptomatic is being investigated for tuberculosis. Two sputum smears were negative. The symptoms persisted despite a course of antibiotics. What is the next step ?

- (A) Do a chest X ray
- (B) Do a culture
- (C) Repeat two sputum smear examination
- (D) Do a chest X-ray ; if negative do a culture

160. For the treatment of a case of class III dog bite, all of the following is correct **EXCEPT** :

- (A) Give immunoglobulin for passive immunity
- (B) Give ARV
- (C) Immediately stitch wound antibiotic coverage
- (D) Wash wound with soap and water

161. How many grams of absolute alcohol does one alcoholic "drink" contain ?
 (A) 5
 (B) 10
 (C) 15
 (D) 30
162. Both alcohol and tobacco are risk factors for :
 (A) Intra-uterine growth retardation
 (B) Amblyopia
 (C) Thromboangitis obliterans
 (D) Chronic parenchymal liver disease
163. Cigarettes Act was enacted in the year :
 (A) 1971
 (B) 1975
 (C) 1983
 (D) 2003
164. Tobacco is not related as a direct risk factor for :
 (A) Buerger's disease
 (B) Ischemic Heart Disease
 (C) Diabetes mellitus
 (D) Oral Cancers
165. Who among the following is known as the "Father of Biostatistics" ?
 (A) Farr
 (B) Hippocrates
 (C) Paracelsus
 (D) Graunt
166. John Snow who laid the foundation of epidemic investigation was by profession :
 (A) A surgeon
 (B) A gynaecologist
 (C) A brewer
 (D) An anaesthetist
167. In India, the Registration of Births and Deaths Act was passed in the year :
 (A) 1859
 (B) 1881
 (C) 1901
 (D) 1921
168. India in 1953 became the first country in the world to launch a :
 (A) Family Planning Programme
 (B) Tuberculosis Control Programme
 (C) Malaria Control Programme
 (D) Maternal and Child Health Programme
169. The world was declared free of smallpox in the year :
 (A) 1972
 (B) 1976
 (C) 1980
 (D) 1984

170. In India, the first ever National Health Policy was enunciated in :

- (A) 1978
- (B) 1982
- (C) 1986
- (D) 1990

171. Provision of basic health care at the village level by a trained Village Health Guide (VHG) is an example of which principle of primary health care ?

- (A) Community participation
- (B) Appropriate technology
- (C) Multi-sectoral approach
- (D) Equitable distribution

172. In the revised targets of health for all, which one of the following will be used to measure "health equity" ?

- (A) Access to safe water and sanitation
- (B) Life expectancy at birth
- (C) Childhood stunting
- (D) Eradication of measles

173. The target year for achieving Millennium Developmental Goals (MDG) is :

- (A) 2010
- (B) 2015

(C) 2020

(D) 2025

174. The theory of "Epidemiological Web of Causation" was forwarded by :

- (A) McMahon and colleagues
- (B) Henle-Koch
- (C) Robert Koch and Louis Pasteur
- (D) John Stuart Mill

175. Education and motivation for a healthy life-style is :

- (A) Primordial prevention
- (B) Secondary prevention
- (C) Health promotion
- (D) Specific protection

176. The inability to carry out certain functions or activities which are expected for that age / gender is known as :

- (A) Disease
- (B) Impairment
- (C) Disability
- (D) Handicap

177. Use of chemoprophylactic drugs to protect against malaria is :

- (A) Primordial prevention
- (B) Primary prevention
- (C) Secondary prevention
- (D) Tertiary prevention

178. Measures that can be applied at the stage of early, discernible disease include :

- (A) Primordial and primary prevention
- (B) Primary and secondary prevention
- (C) Secondary and tertiary prevention
- (D) Primary, secondary and tertiary prevention

179. Time interval between "Sufficient cause" becoming operative and the start of first pathological changes of the disease is known as :

- (A) Generation time
- (B) Latent period
- (C) Lag phase
- (D) Induction period

180. Screening for breast cancer using mammography is :

- (A) Primary prevention
- (B) Primordial prevention
- (C) Health promotion
- (D) Secondary prevention

181. Fortification of foods with specific nutrients is an example of :

- (A) Primordial prevention
- (B) Primary prevention

(C) Secondary prevention

(D) Tertiary prevention

182. A woman 28 weeks pregnant, meets with a fatal accident. While calculating Maternal Mortality Rate she will be :

- (A) Included in the numerator only
- (B) Included in the denominator only
- (C) Included in both the numerator and denominator
- (D) Excluded from both the numerator and the denominator

183. The denominator in Perinatal Mortality Rate is :

- (A) Live births + fetal deaths of 28 or more week gestation
- (B) All stillbirths
- (C) Fetal deaths of 28 or more week gestation + deaths of infants
- (D) All live births

184. If there were 0.5 deaths due to TB per 1000 population in a year, this represents the :

- (A) Cause specific mortality rate
- (B) Proportionate mortality ratio
- (C) Case fatality rate
- (D) Crude death rate due to TB

185. The denominator in crude death rate and crude birth rate is :

- (A) Different for both
- (B) Same for both
- (C) Not applicable
- (D) None of the above

186. Which one of the following is **NOT** a one-way communication ?

- (A) Symposium
- (B) Lecture
- (C) Group discussion
- (D) Role play

187. The best method of health instruction is :

- (A) Providing reading assignments
- (B) Organizing film shows or dramas
- (C) Setting an example
- (D) Giving lectures

188. Receiver's false beliefs are a type of which type of barrier to communication ?

- (A) Physiological
- (B) Environmental
- (C) Cultural
- (D) Psychological

189. The method which is generally more effective in changing human behaviour is :

- (A) Counselling

(B) Focus group discussion

(C) Use of mass media

(D) Extensive use of lectures

190. The best way to teach women in the urban areas about ORS is through :

- (A) Flash cards
- (B) Demonstration
- (C) Lectures
- (D) Role play

191. Endemic typhus is transmitted by the vector :

- (A) *Pediculus humanus*
- (B) Hard tick
- (C) *Xenopsylla* sp.
- (D) Trombiculid mite

192. Trombiculid mite transmits :

- (A) Scrub typhus
- (B) Epidemic typhus
- (C) Endemic typhus
- (D) Relapsing fever

193. The insecticide used against scabies and for treatment of lice is :

- (A) Malathion
- (B) Temephos
- (C) Pyrethrum
- (D) Permethrin

SPACE FOR ROUGH WORK

SEAL