

FINAL EXAM  
DECEMBER 2016

NATIONAL BOARD OF EXAMINATIONS

**PHYSICAL MEDICINE & REHABILITATION****PAPER – I**

PMR/D/16/35/I

Time : 3 hours

Max. Marks : 100

**Important instructions:**

- Attempt all questions in order.
- Each question carries 10 marks.
- Read the question carefully and answer to the point neatly and legibly.
- Do not leave any blank pages between two answers.
- Indicate the question number correctly for the answer in the margin space.
- Answer all the parts of a single question together.
- Start the answer to a question on a fresh page or leave adequate space between two answers.
- Draw table/diagrams/flowcharts wherever appropriate.

Write short notes on:

1. Important developmental milestones between 0-1 year of age. 10
2. Radiological features of rickets and scurvy. 5+5
3. Blood supply of brain with labeled diagram(s). 10
4. Role of Parathormone and Calcitonin in Calcium metabolism. 10
5. Importance of rheumatoid factor, CRP and Anti-CCP in the diagnosis of rheumatoid arthritis. 4+3+3
6. a) What are the different classes of levers? 3+3+4  
b) Give one example of each type of lever as found in human body.  
c) What is the mechanical advantage of each lever?
7. Pathophysiology of autonomic dysreflexia. 10
8. a) Determinants of normal human gait. 5+5  
b) How do they help optimize the energy consumption?
9. What are plantar arches and how are they maintained? Write the functions of each arch and commonly found deviations. 5+5
10. Radiological findings in early and late stages of ankylosing spondylitis. 5+5

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