

POSTGRADUATE INSTITUTE OF MEDICINE
UNIVERSITY OF COLOMBO

OPHTHALMOLOGY MODULE III EXAMINATION – APRIL 2014

ESSAY PAPER

Date :- 30th April 2014

Time :- 1.30 p.m. – 3.30 p.m.

Answer all questions.

Answer each question in a separate book.

1.
 - 1.1 Discuss aberrations of lenses used in ophthalmic practice. Explain your answers giving clinical examples and using ray diagrams. (70%)
 - 1.2 Briefly discuss the options available to overcome these aberrations. (30%)
2.
 - 2.1 List three (03) formulae that are currently used in the calculation of intraocular lens power. Briefly describe the advantages and disadvantages of each of them. (30%)
 - 2.2 Briefly describe the variables that are measured in the calculation of intraocular lens power. (30%)
 - 2.3 List the two (02) main methods of measuring axial length and describe each method briefly. (40%)
3.
 - 3.1 What is the clinical (functional) definition of low vision? (20%)
 - 3.2 What are the non optical low vision devices available? (30%)
 - 3.3 Discuss how a convex lens can be used as a low vision device (use ray diagrams). (50%)
4. Write notes on (include ray diagrams)
 - 4.1 Polarization (25%)
 - 4.2 Total internal reflection (25%)
 - 4.3 Keratometer (50%)