



Saudi Licensing Examinations

Biomedical Technology - Specialist Blueprint

Blueprint outlines

Evaluation Item	Sections	Percentage (%)
(150 MCQs, 3 hours)	1. Biomedical Equipment Technology	15%
	2. Advanced Electronics and Electricity	15%
	3. Anatomy and Physiology	10%
	4. Mathematics	5%
	5. Physics	5%
	6. Chemistry	5%
	7. Medical Informatics	10%
	8. Professionalism	10%
	9. Practical Experience	5%
	10. Research and Design	5%
	11. Patient Safety, Electrical Safety and Hazards	10%
	12. Regulation and Standards	5%
Total		100%

Note:

- Test specifications and content have been reviewed and updated, therefore passrates are adjusted accordingly.

Passing Score: 60%

This applies for any test conducted as of July 18, 2022 and beyond.

- Blueprint distributions of the examination may differ up to +/-5% in each category.
- Percentages and content are subject to change at any time. See the SCFHS website for the most up-to-date information.



References:

- 1- Webster J. Medical Instrumentation: Application and Design. Wiley & Sons: USA. 4th (or latest) Edition.
 - 2- Carr J and Brown J. Introduction to Biomedical Equipment Technology. John Wiley & Sons: Australia, Limited, 4th (or latest) Edition.
 - 3- Ritter A, Hazelwood V, Valdevit A, and Ascione A. Biomedical Engineering Principles. Taylor & Francis Group: FL, USA, 2nd (or latest) Edition.
 - 4- Bushberg J, Seibert J, Leidholdt E, and Boone J. The Essential Physics of Medical Imaging. Lippincott Williams & Wilkins: PA, USA. 3rd (or latest Edition).
- Page | 2 Biomedical Technology Specialist Blueprint
- 5- Floyd T. Electronic Devices (Conventional Current Version). Pearson: England, UK. 10th (or latest) Edition.
 - 6- Tocci R. Digital Systems: Principles and Application. 6th (or latest) Edition.
 - 7- Johnson A. Biology for Engineers. CRC Press: FL, USA. 2nd (or latest) Edition.
 - 8- Guyton A and Hall J. Textbook of Medical Physiology: With Student Consult Online Access (Guyton Physiology). Elsevier. 13th (or latest) Edition.
 - 9- Barnett R, Ziegler M, Byleen K, and Sobecki D. Precalculus. McGraw-Hill: USA. 7th (or latest) Edition.
 - 10- Croft A, Davison R. Mathematics for Engineers: A Modern Interactive Approach. Pearson: England, UK. 3rd (or latest) Edition.
 - 11- McGraw-Hill. Precalculus: Student Edition (Advanced Math Concepts). McGraw-Hill: NY, USA. 1st (or latest) Edition.
 - 12- IJSMI. Essentials of Bio-Statistics: An overview with the help of Software. IJSMI.
 - 13- Glantz S. Primer of Biostatistics. McGraw-Hill: NY, USA. 5th (or latest) Edition.
 - 14- Rao S and Richard J. Introduction to Biostatistics and Research Methods. PHI Learning: Delhi, India. 5th (or latest) Edition.
 - 15- Vasudeva A. Modern Engineering Physics. S. Chand & Co.: New Delhi, India. Revised Edition.
 - 16- Ryan L and Norris R. Chemistry Course book. Cambridge Un. Press: Cambridge, Cambridge, UK. 2nd (or latest) Edition.
 - 17- Gallagher R and Ingram P. Complete Chemistry for Cambridge IGCSE. Oxford: UK. 3rd (or latest) Edition.
 - 18- Sinha P. An Introduction to Computer: Basic Knowledge to computer. Latest Edition.
 - 19- Hall D. Microprocessor and Interfacing Programming and Hardware. McGraw-Hill: NY, USA. 2nd (or latest) Edition.

Note:

- This list is intended for use as a study aid only. SCFHS does not intend the list to imply endorsement of these specific references, nor are the exam questions necessarily taken solely from these sources.