



N 23-20

Biotechnician Assistant Credentialing Exam

## EXAM SPECIFICATIONS FOR PAPER & PENCIL TESTING

The Biotechnician Assistant Credentialing Exam (BACE) consists of both a Practical and Knowledge portion. Candidates take both portions, which cover nine categories, in one session. Candidates must score 80% or above to pass the BACE. Candidates may take the BACE a maximum of three times within a year, with a 20-day waiting period between attempts. **The Paper and Pencil Testing Option must be administered at an Exam Site with live proctors.** The exam is taken in a science lab.

The following descriptions for each portion include the total questions per portion, categories covered, questions per category, points per category, and total points per portion. The exam is closed book with a duration of 4 hours.

BACE Knowledge Portion			
Category	Questions	Points	
General Topics in Biotechnology	16	21	
Technical Skills & Applications	22	31	
Biochemistry/Chemistry	9	9	
Biological Systems	8	9	
Workplace Safety & Behavior	9	12	
Total	64	82	

BACE Practical Portion			
Category	Questions	Points	
Biotechnology Skills	17	38	
Applied Mathematics	11	19	
Laboratory Equipment	8	13	
Research & Scientific Method	9	12	
Total	48	82	

## The following are suggested study references:

- Brown, J. Kirk. <u>Biotechnology: A Laboratory Skills Course</u> (Second Ed.). Hercules, CA: Bio-Rad Laboratories, Inc., 2018.
- Daugherty, Ellyn. <u>Biotechnology: Laboratory Manual</u> (Second Ed.). St. Paul, MN: Paradigm Publishing, Inc., 2017.
- Daugherty, Ellyn. <u>Biotechnology: Science for the New Millennium</u> (Second Ed.). St. Paul, MN: Paradigm Publishing, Inc., 2017
- Seidman, Lisa. <u>Basic Laboratory Methods for Biotechnology: Textbook and Laboratory Reference</u> (Third Ed.). Boca Raton, FL: CRC Press, 2021



- Technical Skills & Applications
- Biochemistry/Chemistry
- Biological Systems
- Workplace Safety & Behavior
- Biotechnology Skills
- Applied Mathematics
- Laboratory Equipment
- Research & Scientific Method