

STUDY GUIDE FOR THE SAT SUBJECT TEST IN BIOLOGY E/M

Bad news first: there's no one right way to study for a test. If you're looking for a surefire shortcut, there simply isn't one. The good news, however, is that if you're reading this, you're already on the right track—you're putting in the three key resources for successful study habits: time, energy, and focus. The following study guide features a few suggested ways to tackle the SAT Subject Test in Biology E/M, depending on whether the test is just around the corner (**1 Week Cram**) or if you've got more time to practice (**7 Week Stretch**).

Remember that these plans are simply suggestions; everybody learns in their own way and at their own pace. When choosing where to begin, use what you know about your own study habits. If cramming for a test hasn't been effective for you in the past, perhaps it's time to try spreading out your practice over a longer period of time. On the other hand, if you find yourself forgetting key material just before the test, you might want to try an intense refresher in the week leading up to the exam.

If you're not sure how best to prepare, we recommend using Practice Test 1 (pages 29–52) as a diagnostic, which means giving yourself enough time to mirror what will be allotted to you on test day, and then working in a quiet and uninterrupted environment. When you're done, check answers against the key on page 54. If you're happy with your results, you might just spend a week focusing on the specific section for which you had wrong answers. On the other hand, if you're struggling across the board, you may be best served by building up those content gaps over the course of a few months. Here are our recommendations.

1 Week Cram

The following schedule is an extremely abbreviated way of gaining maximum exposure to the course. It involves reinforcement over a limited amount of time, so you'll be touching on each bit of content four times—once when you skim the chapter to get a general sense of the ideas within, again when you read the summary to remind yourself of what you're expected to have learned, a third time when you test your knowledge against the drill questions, and finally when you mark key terms that you remain unfamiliar or uncomfortable with. If you have extra time on any given day, we recommend reading the portions of each content chapter that you feel least comfortable with.

Day 0, Sunday [2 hours]

Take Practice Test 1. Keep the results of the test in mind as you go through the next week, and slow down your skimming when you hit a section where you struggled.

Day 1, Monday [1 hour]

- Review Chapter 1, “Introduction.”
- Familiarize yourself with the exam format and our test-taking strategies in Chapter 2, “The Exam Format, Question Types, and Strategies.”
- Skim Chapter 3, “Molecules of Biology.”

Day 2, Tuesday [1.5 hours]

- Review Key Terms (page 91) and Summary (page 93) for Chapter 3. Circle any terms you don't know.
- Complete Drills 1–5 (pages 69, 75, 78, 83, 90) in Chapter 3.
- Skim Chapter 4, “Cell Structure” and Chapter 5, “Cellular Respiration.”



Day 3, Wednesday [2 hours]

- Review Key Terms (page 106) and Summary (page 108) for Chapter 4. Circle any terms you don't know.
- Complete Drills 1–3 (pages 101, 102, and 106) in Chapter 4.
- Review Key Terms (page 120) and Summary (page 122) for Chapter 5. Circle any terms you don't know.
- Complete Drills 1–3 (pages 114, 118, 120) in Chapter 5.
- Skim Chapter 6, “Transcription and Translation”; Chapter 7, “Mitosis and Meiosis”; and Chapter 8, “Genetics.”

Day 4, Thursday [2.5 hours]

- Review Key Terms (page 138) and Summary (page 140) for Chapter 6. Circle any terms you don't know.
- Complete Drills 1–3 (pages 127, 133, 138) in Chapter 6.
- Review Key Terms (page 156) and Summary (page 158) for Chapter 7. Circle any terms you don't know.
- Complete Drills 1–4 (pages 143, 146, 152, 155) in Chapter 7.
- Review Key Terms (page 184) and Summary (page 186) for Chapter 8. Circle any terms you don't know.
- Complete Drills 1–3 (pages 163, 178, and 183) in Chapter 8.
- Skim Chapter 9, “Evolution and Diversity”; Chapter 10, “Microorganisms”; and Chapter 11, “Control: The Nervous and Endocrine Systems.”

Day 5, Friday [3 hours]

- Review Key Terms (page 206) and Summary (page 208) for Chapter 9. Circle any terms you don't know.
- Complete Drills 1–5 (pages 189, 193, 196, 198, and 204) in Chapter 9.
- Review Key Terms (page 224) and Summary (page 226) for Chapter 10. Circle any terms you don't know.
- Complete Drills 1–2 (pages 230 and 234) in Chapter 10.
- Review Key Terms (page 251) and Summary (page 253) for Chapter 11. Circle any terms you don't know.
- Complete Drills 1–8 (pages 230, 234, 237, 241, 243, 239, 250) in Chapter 11.
- Skim Chapter 12, “Transport and Ventilation: The Circulatory and Respiratory Systems”; Chapter 13, “Processing, Support, and Reproduction: The Digestive, Urinary, Skeletal, Muscular, and Developmental Systems”; and Chapter 14, “Plants.”

Day 6, Saturday [3.5 hours]

- Review Key Terms (page 276) and Summary (page 278) for Chapter 12. Circle any terms you don't know.
- Complete Drills 1–5 (pages 258, 261, 265, 272, 275) in Chapter 12.
- Review Key Terms (page 310) and Summary (page 312) for Chapter 13. Circle any terms you don't know.
- Complete Drills 1–5 (pages 287, 293, 301, 305, 309) in Chapter 13.
- Review Key Terms (page 320) and Summary (page 322) for Chapter 14. Circle any terms you don't know.
- Complete Drills 1–2 (pages 317 and 320) in Chapter 14.
- Skim Chapter 15, “Behavior.”
- Take Practice Test 2 (pages 385–410).

Day 7, Sunday [2 hours]

- Review Key Terms (page 328) and Summary (page 330) for Chapter 15. Circle any terms you don't know.
- Complete Drills 1–2 (pages 325, 328) in Chapter 15.
- Skim Chapter 16, “Ecology.”
- Review Key Terms (page 350) and Summary (page 352) for Chapter 16. Circle any terms you don't know.
- Complete Drills 1–5 (pages 336, 340, 342, 345, 349) in Chapter 16.

This is it, your final chance to review. Look at all the circled Key Terms and look at the questions you got wrong on Practice Test 2. If there's any overlap between the two, that's a clear sign that you need more practice in that section, so spend any remaining time reviewing that content. That said, you've been working hard, so don't burn yourself out by pushing for more than two hours. Rest is an important part of studying, too: It's when the mind processes everything.

7 Week Stretch

This schedule doesn't break things into a day-to-day calendar, but helps to establish what you should aim to accomplish within a given week. For some, that may be a matter of evenly distributing the reading material across the week. For others, it may be to spend one day studying, one day reviewing, and one day testing. We have arranged the material by EARLY, MID, and LATE week.

Week 1

- EARLY: Read Chapters 1–3.
- MID: Review the Key Terms and Summary for Chapter 3.
- LATE: Complete Drills 1–5 (pages 69, 75, 78, 83, 90) in Chapter 3.

Week 2

- EARLY: Read Chapters 4–6.
- MID: Review the Key Terms and Summary for Chapters 4, 5, and 6.
- LATE: Complete Drills 1–3 (pages 101, 102, 106) in Chapter 4; Drills 1–3 (pages 114, 118, 120) in Chapter 5; and Drills 1–3 (pages 127, 133, 138) in Chapter 6.

Week 3

- EARLY: Read Chapters 7–9.
- MID: Review the Key Terms and Summary for Chapters 7, 8, and 9.
- LATE: Complete Drills 1–4 (pages 143, 146, 152, 155) in Chapter 7; Drills 1–3 (pages 163, 178, 183) in Chapter 8; and Drills 1–5 (pages 189, 193, 196, 198, 204) in Chapter 9.

Week 4

- EARLY: Read Chapters 10–12.
- MID: Review the Key Terms and Summary for Chapters 10, 11, and 12.
- LATE: Complete Drills 1–2 (pages 218 and 223) in Chapter 10; Drills 1–8 (pages 230, 234, 237, 241, 243, 249, 250) in Chapter 11; and Drills 1–5 (pages 258, 261, 265, 272, 275) in Chapter 12.



Week 5

- EARLY: Read Chapters 13–15.
- MID: Review the Key Terms and Summary for Chapters 13, 14, and 15.
- LATE: Complete Drills 1–5 (pages 287, 293, 301, 305, 309) in Chapter 13; Drills 1–2 (pages 317 and 320) in Chapter 14; and Drills 1–2 (pages 325 and 328) in Chapter 15.

Week 6

- EARLY: Read Chapter 16.
- MID: Take Practice Test 1 (pages 29–52).
- LATE: Review the Key Terms and Summary for Chapter 16, and complete Drills 1–5 (pages 336, 340, 342, 345, and 349). Read Answers and Explanations for Practice Test 1. Use the Key Terms and Summaries to identify and review any sections or topics that you feel uncomfortable with.

Week 7

- EARLY: Take Practice Test 2 (pages 385–410).
- MID: Read Answers and Explanations for Practice Test 2.
- LATE: Re-review any topics you feel uncomfortable with and any questions you answered incorrectly on Practice Test 2.

FINAL NOTES

Don't feel as if you have to limit yourself to one of these templates. This is your test and your book; the most effective practice is likely to be that which you feel most comfortable with and able to commit to. That said, here are a few final pointers for adapting the book:

- Spread out the practice tests so that you can track progress and learn from mistakes.
- Don't gloss over reviewing answers, even to problems that you got right, especially if you guessed.
- If possible, don't cram. Your goal isn't to remember material for a single day—unless you're taking the test tomorrow—so the more that you can check back in on how much you remember from a section over the course of your review, the more you'll be able to retain for test day.

Feel free to use other resources! We've given you the best content review and practice tests at our disposal, but if you're still struggling over a difficult concept, and your teacher can't help, another perspective can only help. (Just make sure you fact-check the source!) The College Board's website features an overview of each Subject Test as well as practice questions: <https://collegereadiness.collegeboard.org/sat-subject-tests/subjects/science/biology-em>