Without Active Learning, You Could Fail USMLE Step 1

Danielle Marshall, MD
Apr 23 10 min



Why Active Learning is so Important for Medical Students

To pass (and nail) USMLE Step 1, memorizing the facts is just not sufficient—you must be able to apply that knowledge. While you may feel accomplished reading 50 pages of First Aid in a day, the real concern is how much of that knowledge you can actually apply. You may now be able to *recognize* and *understand* the material, but have you *mastered* it? The answer is no. Mastery takes time, it takes effort, and it takes active learning to successfully pass the USMLE.

The reality is that heavily using passive learning techniques in your USMLE studies put you at serious risk for a failed Step 1. Let's be honest—just reading through First Aid may be boring, but it is also easy. Watching a USMLE Step 1 video series is even easier and it might even be enjoyable. However, these are both forms of passive learning. Passive learning, by definition, does not require students to draw connections, ask questions, or develop their own answers. All you're doing is reading, watching, or listening to something and hoping that you're going to magically be able to retain the information. As with most exams, passive learning just isn't sufficient to help you avoid a failed USMLE. In fact, the easier and the more passive the studying is, the

Need additional help with an exam?

Elite tutors are qualified, professional, and 100% online.

Schedule a Consult

Never Miss an Article.

Sign up to our newsletter and get the best of Elite Medical Prep, tailored for you.

Email*

Year of Graduation / Expected Y

protected by reCAPTCHA
Privacy - Terms

Submit

TOP ARTICLES

Master the USMLE in 6 Weeks: Your Free Step 1 Study Plan

The USMLE, encompassing Step 1, Step 2, and Step 3, serves as an important milestone in the journey toward medical licensure. Despite the transition of Step 1 to a pass/fail...

Marcel Brus-Ramer, MD, PhD May 10 13 min

Foreign Countries Where the USMLE is Accepted

Did you know that the USMLE is accepted as an equivalent to the national medical exam in a few other countries such as the UAE. Israel. Ireland, and more!

Nina Kagan, MA, MSW May 3 9 min

USMLE Step 1 and Step 2 CK Score Percentiles

How to calculate your USMLE Step 1 or

Related Articles

Read More >

Mastering SOAP Note Style Questions on USMLE Step 2 CK What is Spaced Repetition and Why it's SO Important for USMLE?

Enter active learning. Active learning was first touted in the 1990's with the development of the constructivist learning theory. This theory emphasized that individuals learn best by actively participating in their own learning: building their own knowledge, identifying their own connections between topics, and associating their existing knowledge to form an enhanced understanding (3). As such, active learning is defined as activities done by students to construct knowledge and understanding. They require higher order thinking, also known as, "metacognition." These activities can range from tutoring peers on a tough concept to challenging your knowledge through question sets, to taking notes and making flashcards while going through First Aid for USMLE Step 1. Active learning is the best chance you have at passing Step 1- rather than failing.

Additionally, there is a mountain of evidence supporting the benefit of active learning that stretches back thirty years. In one metanalysis of 225 studies comparing passive and active learning, they found students in traditional lectures were 1.5x more likely to fail than students engaged in active learning (4)! Another benefit of active learning is it mitigates the drop-off in concentration often seen after just 15 minutes of passive learning.

So how do you integrate active learning into your Step 1 schedule? Here are just a few strategies:

1. Summarize hard concepts- e.g., after answering a uWorld, summarize the question in one sentence with the salient details and the answer choice in one or two USMLE Step 2CK score percentile is a common question many medical students ask. Here are the 2020 USMLE Step 1 and Step 2CK percentile charts to see how you compare to other students.

Michael Zobel, MD

Jun 22 8 min

How to Study to Score a 280 on **USMLE Step 2 CK**

Having scored in the 270-280 range on Step 1, Step 2 CK, and Step 3 of the USMLE, I am often asked by students questions like "What's your secret?", "How can I plan my study schedule to...

Rhodes Hambrick, MD

Oct 29 19 min

Boost Your Score in 10 Weeks -Free USMLE Step 1 Plan

The Ultimate 10-Week USMLE Step 1 Study Schedule So you're in med school and 10 weeks away from taking the USMLE Step 1? Don't panic, you still have some...

Marcel Brus-Ramer, MD, PhD

Dec 12 8 min

- sentences (1)
- 2. Retrieve practice— e.g., after reviewing half of the endocrine section of FirstAid, take 10 minutes and physically write down everything you can remember, then compare. Another way is to produce an answer to a USMLE question without scanning the answer choices (2)
- Generate your own questions e.g., after continuing to get questions on the micturition reflex wrong, develop your own questions and answers to cover the concept
- 4. **Develop concept maps** e.g., create *your own* concept trees to identify what clinical characteristics and diagnostics tests distinguish different autoimmune arthropathies (5,6)
- Interweave subjects- e.g., learning about hypersensitivity reactions by studying the
 pathophysiology of Goodpasture's disease. This technique converts important
 information from short- to long-term memory

*Of Note:

In the context of studying for USMLE Step 1, active learning is not enough—it must be paired with **spaced repetition**. Spaced repetition is the idea of learning a bundle of material once, and then reviewing it a designated time later in your study period so you don't "lose it." For example, learning how to read an EKG for one hour, reviewing that material for 30 minutes the following day, reviewing it for 15 minutes the next week. This ensures long-term retainment of knowledge.

It is also worth noting that the above strategies are especially relevant moving into the future as USMLE Step 1 goes pass/fail. As schools and students alike may regard Step 1 as "easier" after January 2022 due to its shift away from a numeric score, it is critically important that studying is still taken seriously. A failed Step 1 exam has always had potentially serious consequences. This is not to say that it's impossible to bounce back from a failure, however, successfully passing the USMLE on your first attempt is in important step in landing the residency of your dreams. Even if a numberic Step 1 score will no longer exist, meaning you don't have to go crazy trying to get a 260, you are sorely mistaken if you think that Step 1 is set to become an exam you can pass by just flipping through First Aid.

Further, integrating the strategies above into your study schedule may feel tedious or like extra work, but they are worthwhile. Step 1 is important, so make your studying productive and effective!

- Bonwell, C. C., and Eison, J.A. (1991). Active learning: creating excitement in the classroom. ASH#-ERIC Higher Education Report No. 1, Washington, D.C.: The George Washington University, School of Education and Human Development.
- 2. Brame, C.J. and Biel, R. (2015). Test-enhanced learning: the potential for testing to

- promote greater learning in undergraduate science courses. CBE Life Sciences Education, 14, 1-12.
- 3. Bransford, J.D., Brown, A.L., and Cocking, R.R. (Eds.) (1999). How people learn: Brain, mind, experience, and school. Washington, D.C.: National Academy Press
- Freeman, S., Eddy, S.L., McDonough, M., Smith, M.K., Okoroafor, N., Jordt, H., and Wenderoth, M.P. (2014). Active learning increases student performance in science, engineering, and mathematics. Proceedings of the National Academy of Sciences USA 111, 8410-8415.
- 5. Handelsman, J., Miller, S., and Pfund, C. (2007). Scientific teaching. New York: W.H. Freeman.
- Novak, J.D. and Canas, A.J. (2008). The theory underlying concept maps and how to construct and use them. Technical Report IHMC.

About the Author

Danielle Marshall, MD

In 2012, Danielle Marshall graduated from the University of California, Berkeley with a BA in Cellular Biology and a minor in Global Poverty. Shortly after,...

Read More

Featured Articles

Elite Medical Prep

When to Take Step 2 CK for the 2026 Residency Match

Elite Medical Prep

How Much Time Should You Actually Spend Studying For Step 3? Elite Medical Prep

Matching Into Orthopedic Surgery Residency Elite Medical

Maximize Step 2 Stu Intensive : Prep