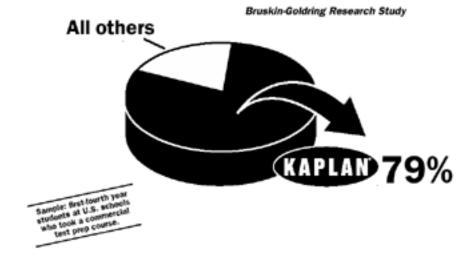


American Medical Student Association Massachusetts Institute of Technology web.mit.edu/amsa/www Cambridge, MA 02139

American Medical Student Association MIT Premedical Chapter

# What MCAT course did people who got into medical school take?



Call today to enroll!



### Premed Guide

3rd Edition

published by American Medical Student Association MIT Premedical Chapter

#### Premed Guide 2004

#### **EDITORS**

Rupali Avasare Nasheed Jamal Rina Patel Raymond Raad Irma Rangel (cover) Peng Wu (Layout) Bob Yin As a premed student, there are certain questions that always run through your head: "what's the MCAT going to be like?", "who will write me recommendations?", "how can I distinguish myself from the thousands of other applicants out there?"

As a premed student AT MIT, more questions arise: "which classes sat-

isfy my premed requirements?", "when should I take certain classes", "what does MIT offer for premed students?" We hope to answer all your questions--as a MIT student and a premed student--in this guide.

The third version of the guide has been updated to reflect new statistics and recent changes to the course schedule. Hopefully, these additions will provide you with the most updated information about being premed at MIT.

Sincerely,

#### The AMSA Executive Board:

President: Raymond Raad

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#### AMSA: MIT PREMEDICAL CHAPTER

The American Medical Student Association (AMSA) is a national organization of medical and premedical students (www.amsa.org). At MIT, AMSA hopes to serve the premedical student community through various service, social, and informational events.



"The last time someone went into Medical Records, they were lost for a week."

MIT AMSA has two primary goals. First, we wish to provide all MIT undergraduates with the resources that will allow them to

make an informed decision about studying medicine. Our second goal is to provide premedical students with the chance to look into the lives of doctors, patients, and researchers as to better understand their unique career path.

It is our hope that active premedical students who are driven to learn and participate will result in better doctors.

For the most recent listing of our planned events, please visit our website at http://web.mit.edu/amsa/www. For additional information, please e-mail amsa-exec@mit.edu.

Sincerely,

AMSA Executive Board 2003-2004 amsa-exec@mit.edu

#### STATISTICS: MIT PREMED APPLICANTS

The following data on MIT 2003 applicants was reported by the Association of American Medical Colleges (AAMC):

Total number (undergraduate, graduate, alumni)	153
Female	59%
Male	41%
Total MIT Acceptance Rate	74%
National Acceptance Rate	53%
Undergraduate Applicants	82%
First Time Applicants	78%
Re-Applicants	66%
Underrepresented Minority Applicants	79%
Average Undergraduate GPA	3.49/4.0*
Average Accepted Undergraduate GPA	3.70/4.0*
Range of Accepted Undergraduate GPAs	$3.31-4.0^{\circ}$
Range of Denied Undergrate GPAs	$2.48-4.0^{\circ}$
Average Undergraduate MCAT score	30.85
	32.87
Average Accepted Undergraduate MCAT score	25-39
Range of Accepted MCAT scores	
Range of Denied MCAT scores	17-34

44% of the Class of 2001 earned a B.S. in Biology only. Students from various departments, including Managements and Mechanical Engineering, applied. Double majors comprised 14% of the applicant pool.

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<sup>\*</sup> Based on AAMC 4.0 scale, not MIT 5.0 scale. Check the MIT Careers Office website for the most up-to-date statistics

#### Introduction

#### The Wrong Idea

One of the classic questions medical school interviewers ask is, "Why do you want to be a doctor?" Obviously there is more than one right answer to this question, but there are also a few wrong ones. Perhaps the worst answer is "for the money." As a patient yourself, it's likely that you would rather have a physician who cares more about your health than your checks. Also, a career in medicine often involves long, tiring hours. Most people would not want to work so hard at a job they do not really enjoy, no matter how much money they can get out of it.

Other inadequate reasons for entering a career in medicine include parental approval and job security. Although all of these reasons are important to consider, they should not be the sole motivations for choosing a career path. In fact, several other careers would fit such a description (e.g. investment banker, engineer, etc.). Thus, you should regularly evaluate your reasons for becoming a doctor throughout your years at MIT. You will only be able to convince your interviewer if you are first able to convince yourself.

#### Assessing the Reality of Being a Doctor

One of the most important things to do before deciding to pursue medicine is to become familiar with the medical field. Medicine is an ever-changing field, especially with the growing involvement of government, insurance companies, and lawyers. Many people describe hospitals as businesses in which a doctor has relatively little say. Also, as mentioned, a medical career usually means working long hours at irregular times. In order to understand the



He had taken every side street he knew but the paperwork was still on his tail.

realities of medicine, you should speak with doctors and medical students, shadow a doctor, or volunteer. The "Timeline" section of the guide gives more details about these and other activities that can give you a better idea of what it means to be a doctor.

All of the factors mentioned are important to consider when deciding on a career in medicine. Hopefully the AMSA Premed Guide will also be a useful tool in helping you decide on the right career path.

Length of Program: 7-10 years

Timeline: Generally, the first 2 years are in Medical school, the next 4-6 years are spent getting a PhD and the last 1-2 years are spent in medical school. *Details:* MIT premeds in general have strong science backgrounds and many of them are research oriented. Many MIT premeds are interested in MD/PhD programs, which are designed for those who want to learn how to practice medicine as well as engage in medical research. Most graduates of these programs try to incorporate both clinical practice and research in their careers.

Admission to these programs is more selective than to regular MD programs. Applicants must have strong MD applications and extensive research experience. At most institutions, the MD/PhD programs have stricter GPA and MCAT requirements than the regular MD programs and also look specifically for previous research experience. However, do not be discouraged. As one of the top research institutions, MIT offers many opportunities that can help you prepare for MD/PhD programs.

Although it varies from one school to another, most MD/PhD programs are structured similarly. The first two years are spent in medical school. Students spend these two years with the regular MD students. The next 4 or 5 years are spent on a PhD, and the last one to two years are spent in clinical rotation in a hospital (like the last two years of medical school). Most students do not complete both degrees in fewer than 8 years. Since this can be a financial problem, 39 out of about 120 MD/PhD programs are funded through the MSTP (medical scientist training program). These students are funded for the entire duration of study, including medical school. A listing of MSTP schools can be found at http://www.nigms.nih.gov/funding/mstp.html. A complete list of MD/PhD programs is online at the American Association of Medical Colleges website (www.aamc.org)

Introduction Dual Degrees: MD/PhD in Detail

#### Dual Degree Programs

#### MD/MPH (Masters in Public Health)

The MD/MPH program is for individuals interested in seeing how medicine impacts large groups of people. The School of Public Health typically has the following concentrations: Health Management and Policy, Biostatistics, Toxicology, Epidemiology, Health Behavior and Health Education.

*Tests Required:* MCAT, GRE (usually waived, check individual schools) *Application Process:* In most cases, students apply to medical school and the school of public health separately

Length of Program: 4-5 years

*Timeline:* Varies from school to school. Generally, the MPH degree is earned in one year either before the 1st year of medical school, between the 3rd and 4th years, or after the 4th year.

#### MD/MBA (Masters of Business Administration)

The MD/MBA program combines business and medicine for people interested in pursing careers in hospital management.

Tests Required: MCAT, GMAT (usually waived, check individual schools) Application Process: Depending on school, students may either apply separately to school of management and school of medicine, OR apply to school of management during the third year of medical school.

Length of Program: 5 years

*Timeline:* Varies from school to school. Generally, first three years are medical school, 4th year is spent in school of management, and 5th year is integrated.

#### MD/JD (Juris Doctor, Law Degree)

The MD/JD program is intended to attract individuals interested in health policy and health care law. Graduates of this program go on to be doctors, lawyers, politicians and consultants.

Tests Required: MCAT, LSAT

Application Process: Apply separately to college of law and medical school. Length of Program: 6 years, including summers

*Timeline:* Varies from school to school. Generally, first 3 years are spent in medical school, and next three years are integrated.

#### MD/PhD (Doctor of Philosophy)

*Tests Required:* MCAT, GRE (recommended, but varies with Graduate School) *Application Process:* Depending on school, either separate applications are required, or one application is needed for MD/PhD

#### Subject Recommendations: Classes at MIT

Certain classes are required for admission to medical school. In addition to your GIRs (General Institute Requirements) and courses in your major, you must also fulfill the general academic requirements for medical school. These include, but are not limited to:

One year of physics with lab (8.01 and 8.02, or equivalent, *usually* fulfill this; check with individual med schools)

One year of calculus (18.01 and 18.02, or equivalent)

One year of biology with lab (7.01x and 7.02 and 7.021)

One year of general chemistry with lab (5.111 or 5.112 or 3.091 and 5.310 or 5.311)

One year of organic chemistry with lab (5.12 and 5.13 is recommended, see below for other options)

One year of English literature and/or composition (two 21W and/or 21L classes is fine for *most* schools)

Fortunately for you, MIT requires almost all of these classes as GIR classes anyway. However, you should check the requirements for each school to which you are applying for a complete set of requirements. For example, some medical schools require behavioral science classes such as psychology. The *Medical School Admissions Requirement (MSAR)* guide is a good source of this type of information and is available through the American Medical College Association (AMCAS) <a href="http://www.aamc.org/students/amcas/start.htm">http://www.aamc.org/students/amcas/start.htm</a>. Also, the MIT Careers Office <a href="http://web.mit.edu/career/www/preprof/premed.html">http://www.aamc.org/students/amcas/start.htm</a>. Also, the MIT Careers Office <a href="http://web.mit.edu/career/www/preprof/premed.html">http://www.aamc.org/students/amcas/start.htm</a>. Also, the MIT Careers Office <a href="http://web.mit.edu/career/www/preprof/premed.html">http://www.aamc.org/students/amcas/start.htm</a>. Also, the MIT Careers Office also keeps an updated copy of the MSAR. To help you with selecting your GIRs, here is a list of classes with summaries and short reviews.

#### <u>B</u>IOLOGY

The Biology requirement is normally satisfied by taking 7.01, 7.02 (lab class), BE1909, or 10.702. Some MIT premeds suggest taking an additional biology class such as 7.03 or 7.05, because the MCAT has an emphasis on biological science. Many students come to MIT with AP credit for Biology or 7.01. This is acceptable for fulfilling the 7.01 premed requirement. However, you will need to take an upper-level biology class in addition to your laboratory class (7.02 or BEH.109). The following are descriptions of MIT Biology classes

that satisfy this other requirement:

7.012, 7.013, 7.014 Introductory Biology (choose one) 12 units GIR, Fall and Spring

All 7.01x classes cover the same core materials, including the principles of biochemistry and genetics, molecular biology, and gene regulation. But each version has different professors, and a different emphasis.

7.012 (Fall only): Exploration into areas of current research in cell biology, immunology, neurobiology, developmental biology, and evolution.

7.013 (Spring only): Application of the fundamental principles toward an understanding of human biology. Topics include genetics, cell biology, molecular biology, disease (infectious agents, inherited diseases and cancer), developmental biology, neurobiology and evolution.

7.014 (Spring only): Application of the fundamental principles toward an understanding of microorganisms as geochemical agents responsible for the evolution and renewal of the biosphere and of their role in human health and disease.

#### 7.02 Introduction to Experimental Biology

18 units, Fall and Spring

7.02 includes a SciComm section similar to the old 7.021 class. The lab portion of 7.02 includes lectures and two 4-5 hour lab sessions each week. SciComm is the writing portion which includes short assignments on science writing as well as one long lab report. 7.02 is a time-consuming class—you can finish as late as 6:00pm on some days in the semester. This is a very good intro class for any type of UROP in biology and a prerequisite for Project Lab (course 7 students only), as it will introduce to you to almost all of the basic techniques used in a biology research lab. Take this class early if you are course 7, but otherwise take it when you have time and are not taking a heavy load. This class is graded mainly on exams and writing assignments, with consideration given to lab conduct and technique. You don't need to get the desired experimental results to receive full credit for the lab portion of the grade.

#### 7.03 Genetics

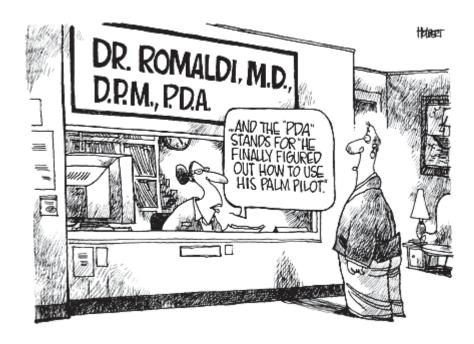
12 units, Fall only

Genetics offers a comprehensive survey of genetic principles, and has a heavy emphasis on quantitative problem solving. The curriculum cannot be found in any genetics textbook, so you will have to rely on attending lecture and reviewing lecture notes to learn the principles. But the bulk of the course is problem solving, and all problem set assignments and exams will be composed of highly quantitative genetics problems. Taking this class will give you a firm grasp on the genetics that you need to know for the MCAT, but you may want to weigh this option carefully, since 7.03 covers a lot more

ity works better for you. As long as you consistently ask yourself, "Am I sure that I want to and can be a good doctor" and "Can I convince someone else that I want to and can be a good doctor", then you should be well prepared by the time you apply.

Whom should I ask for recommendations?

As mentioned in the Recommendations section of this guide, one great place to look for a recommendation is with your UROP advisor. He/she will have worked with you in close contact and would be able to give a personal account of your interactions with each other. However, if you do not have a UROP, do not worry - there are other chances to get to know a professor or instructor well enough for them to write you a letter. Other possibilities are coaches (if you are on a sports team), volunteer supervisors, or even professors for your courses whom you have gotten to know well. The key is not who the person is, but how well they know you. Some people are preoccupied with getting reknowned professors to recommend them, but if you do not know the professor well, his or her letter will not be useful no matter how famous he or she is.



Classes: Biology Frequently Asked Questions

choice of major, because that decision should be determined by your academic interests and how useful you feel your major would be. Just because many bio majors are also premeds does not make bio classes harder, nor does it make admissions committees frown upon bio majors. No matter what course you choose, you will have to get good grades and commit to activities that make you stand out from the rest of the applicant pool.



"My daughter's medical school loans?
Oh no, I just paid off MY medical school loans."

Should you take 5.07 or 7.05?

If you are a biology major or looking for the premed requirement, you can take either 5.07 or 7.05 for biochemistry. But if you are a chemistry major, you must take 5.07. Most students agree that 5.07 is more challenging than 7.05. However, it is not necessarily easier to get a higher grade in one or the other. Which one you take should depend on whether your interests lean more

towards biology or chemistry. Although both classes cover the same biological processes and reactions, there are subtle differences in their emphases. 7.05 is a biologist's biochemistry in that it maintains a careful eye on the big biological picture at all times. It also covers some laboratory methods that are useful to biologists. 5.07, on the other hand, is a little more theoretical in that it places more emphasis on the detailed chemical mechanisms that constitute the biological processes.

#### Is volunteering in a hospital a requirement?

A doctor's job requires considerable unselfishness and involves spending a lot of time in places and situations that most people would not find enjoyable or comfortable, such as an emergency room. Therefore, it is in the interests of medical schools to take students that have been exposed to similar situations and have been unselfish. It is also in your (the premed's) interests to place yourself in a situation among less fortunate people in order to convince yourself that you are truly interested in and able to commit yourself to this profession. Many students have found that volunteering in a hospital exposes them to the lives of doctors and helps them make their career decisions, but there are other ways to reach the same goal. You may find that volunteering at a homeless shelter, shadowing a doctor or some other activ-

material than is needed for the MCAT. 7.03 is a requirement for Course 7 majors, but is also a popular science elective for Biomedical Engineering (BME) Minors.

7.05 (or 5.07) General Biochemistry

12 units, Spring only

7.05 is required for HST and most MD/PhD programs even though your PhD work might not be in biological sciences. This course covers cellular respiration and the synthesis of DNA, RNA, and proteins in great detail. It has emphasis on the pathways involved in these processes. The information provided is more detailed than MCAT questions, but knowing the general scheme of biochemistry is essential for the MCAT. The exams in 7.05 are open book and open notes, and the class is graded on an absolute scale. In the past, an exam average of 80/100 or above meant an A. The last exam is during finals week, but it is not a cumulative final. Some people take 5.07 in lieu of 7.05—see the section on Chemistry courses and the FAQ section for details.

#### **CHEMISTRY**

Since MIT no longer accepts a 5 on AP Chem for 5.111/2 credit, all students must take the introductory class. One year of general chemistry and one year of organic chemistry, with lab, are the requirements for most medical schools. The following are a list of MIT Chemistry classes that premed students often take to satisfy requirements:

5.111 or 5.112 Principles of Chemical Science or 3.091 Introduction to Solid-State Chemistry (choose one)

12 units GIR, Fall and Spring

These are the introductory chemistry classes. If you have taken AP Chemistry and feel fairly confident, take 5.112. If you are more into engineering, 3.091 might be a better course for you.

5.12 Organic Chemistry I

12 units, Fall and Spring

This course tries to balance memorization of reactions and solving of "organic puzzles" and "road maps". Since different professors have been teaching the curriculum each semester, this course is constantly changing. Check with the Chemistry Department to find out which professors are teaching the course when you want to take it. Most students take it during freshman or sophomore year.

5.13 Organic Chemistry II

12 units, Spring only

5.13 is the second year of organic chemistry and draws on basic principles (i.e. nucleophiles, substitution/elimination reactions, etc.) except at a greater depth. If you enjoy chemistry, this is an interesting but challenging class. Some of the topics (i.e. spectroscopy) and specific reactions have been known to show up on the MCAT.

5.07 Biochemistry I (or 7.05)

12 units, Fall and Spring

If you prefer to learn biochemistry from a chemical/mechanistic point of view, 5.07 can be taken in place of 7.05. The first half of the course introduces the basic types of reactions in biochemistry, emphasizing a lot of organic chemistry. In doing well in this class, success in 5.12/5.13 is a definite plus. The second half moves into the details of metabolism, building upon the general reactions presented in the first half. The chemical reactions of biochemistry are studied in more depth in 5.07 than in 7.05, but some have claimed that the subjects covered are less broad.

5.310 (non-majors) or 5.311 (majors) Introduction to Chemical Experimentation

12 units, Fall and Spring

All of AP Chem or 5.111/5.112 shows up in this lab class. Except for course 5 students (who take 5.311), 5.310 is sometimes taken late in the game (senior year) because of numerous lab requirements for other majors. Lab is TR1-5 or MW1-5, with Friday being the make-up day. There are also 2 one-hour lectures. There are lab reports and quizzes, but in general this is known to be a relatively light class—many people can do two days' worth of lab work into one day.

5.60 Thermodynamics and Kinetics

12 units, Fall and Spring

The spring version of 5.60 is supposedly easier, whereas the fall class is smaller but more intense. Although some people do not consider it to be a particularly hard class, the concepts and problem sets can get abstract and difficult. Though 5.60 is not an explicit requirement for most medical schools, MIT premeds often take the class in lieu of 5.13. However, not all medical schools will accept 5.60 as a replacement for the second semester of organic chemistry. The knowledge acquired in 5.60 can be useful in the physical sciences section of the MCAT.

#### Frequently Asked Questions

Does it help if my parents are doctors?

Studies have shown that there is little correlation between getting into med school and having parents who are doctors. However, having a parent who is a doctor will help give you a better understanding of the medical field.

Do I have a better chance of getting into a school in my state?

State medical schools are obliged to enroll a high percentage of in-state residents. For instance, if you are from California, you will have a better chance of getting into the UC medical schools than out-of-state applicants. State medical schools often have lower tuition rates for in-state students than for out-of-state students.

Should I do a UROP while taking 7.02?

Although it may seem like a lot of lab time if you engage in both of these during the same term, you may find that they build upon each other. That is, what you learn in 7.02 could be applied to your UROP and vice versa, making both activities a little easier. This is most true if you are doing a UROP in a bio lab, where many of the techniques you will need to learn will be covered in depth in 7.02. If your schedule allows, it may be even a better idea to take 7.02 before starting a UROP, so that you are more familiar with the techniques (making it easier to find a more selective UROP position). Also keep in mind that both activities may be more of a time drain than you expect.

Should I complete 5.13 before taking the MCAT?

5.13 is definitely helpful for the Organic chemistry that you will encounter on the MCAT. If you can fit it into your schedule, take the course before you take the MCAT. Even having the first few weeks of the course under your belt will be helpful. But it is possible to learn, and learn well, the orgo you need for the MCAT on your own.

Is it hard to get an A in classes with a lot of premeds (i.e. 5.12, 7.03, 7.05)? You will find that performance in these classes is higher than in freshman GIRs such as 8.01 and 18.02, since many more students are now shooting for an A. But do not let this challenge hold you back, since you will have to face it if you want to be a successful premed.

Since so many premed are biology majors, should I not be Course 7? It is true that many premeds are Course 7. But that should not affect your

#### <u>Some Common Interview Questions</u> from the MIT Careers Office

- How did you decide to become a doctor?
- Why did you apply to this medical school?
- What are you interested in concerning this medical school?
- What do your friends or family think of your plans to become a doctor?
- Tell me about a book you have read recently.
- What do you read for leisure?
- Tell me about a current issue in medical education today that interests you.
- Do you think you could work with "sick" people every day?
- Have you had any volunteer or patient contact experience?
- Is this school your first choice?
- What other schools are you applying to?
- Tell me something about MIT. Did you like it? Would you go again?
- Do you have any hobbies?
- What is your impression about the MCAT? Do you think it's a helpful tool?
- Do you think that you can handle the medical school curriculum? Why?
- Do you have any questions you'd like to ask me?
- Do you know what area of medicine interests you now?
- Do you plan to go into any specialty area?
- You seem to have a great deal of research experience. Are you sure you want an MD and not a PhD?
- Tell me more about your grades. Do you feel you have done well in the sciences? What interests you in the humanities?
- Who would you say most influenced you to become interested in medicine?
- Do you think you would complete your medical education?
- Tell me something about your extracurricular activities.
- Would you enjoy working as a physician?
- Is there anything else you would like to tell me about yourself?

#### **PHYSICS**

8.01 and 8.02 Physics I and II (any version)

12 units, Fall and Spring

Two semesters of physics are required for medical school. Most schools specifically require physics "with lab", but they often make exceptions for MIT students, so 8.01 and 8.02 are fine. (Check with individual schools.) Nevertheless, 8.01X and 8.02X are encouraged because of the lab components. The material will be covered on the MCAT, but not as thoroughly as they are at MIT.

#### **M**ATHEMATICS

18.01 and 18.02 Calculus I and II (any version)

or 18.01A/18.02A, a single class that satisfies the entire requirement 12 units, Fall and Spring

These are good classes to get out of the way early, since they help you with the material in later classes. Basically any sequence that covers material up to the end of 18.02 will work. The single course 18.01A/18.02A can help you finish the requirement more quickly.

18.03 Differential Equations

12 units, Fall and Spring

18.03 is recommended, and often required (check schools individually), for anyone applying to MD/PhD programs or the MD program at HST. It is also required for all engineering majors.

#### **E**NGLISH

You need to take two semesters of English literature, involving composition to demonstrate your ability to communicate with others in writing. This may be satisfied by taking writing classes as well. We recommend that you take one of the 9 or 12 unit 21W classes that are listed under the "Exposition and Rhetoric" subheading. The other class could be a 21W (preferably Science Writing or Technical Communication Studies) or a 21L class concentrating in Literature. MIT's writing and literature departments are very good, with professors who are quirky and entertaining. Check the most recent HASS guide for classes that will fulfill your English requirement.

Classes: Physics/Math/English

#### CI Requirement

MIT requires each undergraduate to complete four communication intensive (CI) classes. The CI requirement only applies to the 2005 class and later. Two of these CI classes are part of the HASS requirement (CI-Hs), and the other two are classes within the student's chosen major (CI-Ms). The CI-Ms are often included in the major program requirements, but one must choose CI-Hs independently. A list of CI-Hs can be found at <a href="http://web.mit.edu/hass/">http://web.mit.edu/hass/</a> www/guide/cicourses.html. The website has a comprehensive description of the length and number of writing assignments, quizzes, finals, midterms, readings, and other assignments for almost all the classes. Most, but not all, CIs are also HASS-Ds. Because a minimum of three HASS-Ds are also required, many people choose to take these (D-CIs) types of classes, and fulfill both requirements at once. Also, premed students must take two English classes (as described in the English section). Taking certain classes such as Intro to Fiction and Rhetoric should fulfill the pre-med (check with indivual schools) and HASS-CI requirements and two of the three HASS-D requirements. A more in depth description of the communication requirement can be found at http://web.mit.edu/commreq/.

# Special Thanks to... Cartoon Resource

for introducing humor into the premed guide

http://www.cartoonresource.com

#### Application Process: Interviewing

What do medical school admissions staff ask during an interview? An interview is given to a select number of students that have been selected from their primary and secondary applications. An interview is often the last step in getting into a medical school; therefore, it is sometimes your last chance to make a favorable impression on the admissions committee. During an interview, the committee members try to assess your character and personality. Interpersonal communication skills come into play during an interview. Thus, these skills are important to work on.

Some key characteristics that will round out your overall impression on the admissions committee are:

- confidence: don't hesitate to firmly and confidently shake your interviewer's hand at the beginning and end of the interview
- eloquence: be prepared to talk about yourself, your interests, your academic pursuits, and your reasons for becoming a doctor, for they will certainly ask you at least this information
- be knowledgeable about your field of study and ready to discuss any aspects of it at great length

Be prepared to talk about aspects of your background that could possibly be assessed as negative: a low grade point average, no participation in outside activities, etc. A good strategy to implement in negative situations is to convince the admissions committee member that positive attributes can be found in the negative ones. For example, a low GPA might be a result of your heavy involvement with the local homeless shelter, or the fact that you had to support your college career with a full-time job. Or lack of participation in outside activities can be the effect of working with the faculty on a new initiative of experience-based learning.

Practicing interviewing is a good way to get rid of the pre-interview anxieties. A few questions that are often asked during an interview are listed on the following page, as suggested by the MIT Careers Office. Determining your answers to these ahead of time can save you a lot of anxiety as well as give you prepared, confident, well-spoken appearance. The Careers Office and your prehealth advisor can help you with mock interviews.

- Use concrete examples from your life experience to support your thesis and distinguish yourself from other applicants.
- Write about what interests you, excites you. That's what the admissions staff wants to read.
- Start your essay with an attention-grabbing lead an anecdote, quote, question, or engaging description of a scene.
- End your essay with a conclusion that refers back to the lead and restates your thesis.
- Revise your essay at least three times
- Visit the Career's Office, your prehealth advisor, and writing center resources (http://web.mit.edu/writing/) for help editing your essay.
- In addition to your editing, ask someone else to critique your personal statement.
- Proofread your personal statement by reading it out loud or reading it into a tape recorder and playing back the tape.
- Write clearly, succinctly.

#### The Don'ts

- Don't include information that doesn't support your thesis.
- Don't start your essay with "I was born in...," or "My parents came from..."
- Don't write an autobiography, itinerary, or résumé in prose.
- Don't try to be a clown (but gentle humor is OK).
- Don't be afraid to start over if the essay just isn't working or doesn't answer the essay question.
- Don't try to impress your reader with your vocabulary.
- Don't rely exclusively on your computer to check your spelling.
- Don't provide a collection of generic statements and platitudes.
- Don't give mealy-mouthed, weak excuses for your GPA or test scores.
- Don't make things up.



"These drugs will effect your short term memory, so you better pay me now."

#### The Plan: A Timeline of the Premed Track

Applying to Medical School can be a daunting task, but we'll help to simplify it by breaking down the most important things to do, and when to do them. The most critical thing is to get started early, because you don't want to rush any of it. Don't let time determine the quality of your application!

Go to the Careers Office website http://web.mit.edu/career/www/preprof/ premed.html for a comprehensive timeline that covers all four college years. Here, we have only emphasized the most important tasks.

Things you should be thinking about during all four years at MIT:

- Engage in extracurricular and volunteering activities that INTER-EST YOU, whether or not they are related to medicine. Med schools want applicants with a passion for their activities, so doing things that interest you will eventually show through in your application and interview.
- 2. Explore your true motivations for wanting an MD degree. If you are in it for patient care, put yourself in an environment with patients, such a shadowing a doctor or volunteering in a hospital. If you are interested in MDenabled research, read some journals or better yet, work in a research lab. Whatever your reasons are for studying medicine, engage in activities that validate these motivations. You don't want to question your own desire to study medicine, nor do you want the admissions committees to doubt your motivations.
- Get to know your professors and supervisors if at all possible. You want to have good options when it comes time to ask for recommendations. Three to five letters of recommendation is the norm.
- Make the most of your summers, whether it is doing solid studying for the MCAT, or engaging in meaningful activities and jobs. But remember to start planning your summers early, as many summer programs have application deadlines as early as January.

#### Freshman Year: Never Too Early to Start

- Some of your GIRs will satisfy your premed requirements. Examples: 8.01, 8.02, 18.01, 18.02, 7.01x, 5.11x/3.091. However, do not purposely take premed classes first semester so that the grades don't appear on your record.

- This is traditionally the year you will have the most free-time for activities, so get involved in activities that pique your interest. If there are none, start one!

#### Summer after Freshman Year

This is a great time to do something both fun and meaningful—maybe even something you can talk about in your personal statement in the future. Your options:

- Since you have only taken the required classes, finding a challenging summer position may be difficult. If you really want an internship, start searching EARLY. MIT's Freshman/Alumni Summer Internship Program (F/ASIP) has successfully assisted its participants in finding good summer positions. Application for F/ASIP is due August 16th (the summer before your freshman year).
- Other summer jobs: You don't have to work as an intern. There are other summer jobs out there that can be rewarding and challenging. Some people choose to work as summer camps, for example.
- Volunteering: Some people also choose to volunteer in the summer. This is a convenient time if you want to volunteer in a hospital, because you might be too busy during the school year. Remember that medical school admissions committees know that many applicants complete volunteer work at a hospital, so you want to be committed to the volunteer work and stand out from other applicants. Be friendly and try to get to know staff and supervisors, so that they can vouch for your personal merits if needed. Remember to check with the Public Service Center for interesting volunteering opportunities, and with the Alumni Office for externships.

#### SOPHOMORE YEAR: GET YOUR ACT TOGETHER!

Your grades in sophomore and junior years will be the most important grades on your application. The first term of sophomore year is a tough transition for many people, even if you have already been on grades for one semester, so prepare yourself for harder classes and tighter schedules.

- Finish more GIRs and premed classes and start completing classes in your major
- If you are thinking about taking the MCAT in August of the following

#### Application Process: Personal Statement

The personal statement is required on the primary AMCAS application. This statement allows you to talk about whatever you would like the admissions committee to know that is not stated elsewhere in your application. Appropriate topics to discuss would include your compassion for and dedication to medicine by discussing the events, experiences, and people important to your decision to become a medical doctor. Often the personal statement is the first time an applicant is required to put their reasons for becoming a doctor in words. This question deserves a lot of time and should not be taken lightly, since you will be asked this many, many times by interviewers, admissions committee members, and your friends and family.

When drafting your personal statement, start by deciding what the message of your personal statement will be. What kind of theme do you wish to communicate? Write about what excites you; for if it truly excites you, your enthusiasm will undoubtedly be demonstrated in your essay. As always, project your strengths onto your essay, but don't reiterate positive comments you've already stated elsewhere in your application. Even if your personal experiences seem mundane, write about them in detail and they will be unique and interesting. For example, perhaps a student chooses to discuss her UROP in the biology department working with bacteria in her personal statement. While many students may have a UROP in the biology department, she could make her experience sound more unique by talking about the new prokaryotic gene she discovered and cloned. The purpose of making your personal statement specific is to keep the topic interesting and engaging.

Conclude by coming back to the main message of the essay and show how you have demonstrated or "proved" your thesis. Revise the essay by putting it away for a period of time such that you don't look at it; when you come back to edit it after this length of time, you may see problems with sentence structure and wording that were not evident before.

From www.accepted.com's website, some tips for writing a personal statement: (also see the Careers Office online workshop)

#### The Do's

- Unite your essay and give it direction with a theme or thesis. The thesis is the main point you want to communicate.
- Before you begin writing, choose what you want to discuss and the order in



"I feel like I'm part of a great team working here."

A frequent question from premed students is how one should approach a possible recommendation writer. First make sure to get to know that person better so that the professor or advisor can get to know you better early on. A good place to start is getting a UROP in your major. The UROP does not have to be in biological sciences; the purpose of a UROP is to show your dedication and ability to think flexibly (see the section on UROP). A UROP puts you in a close setting with not only your immediate advisor (graduate

student, postdoc) but also with the principal investigator, depending on the size of the lab and the atmosphere of the group.

It is a little more difficult to approach a professor from your class. The smaller the class, the easier it is for you to get to know the professor and be motivated to participate in class. Small seminar classes are great. Your major advisor can also be a great person to ask for a recommendation, especially if you keep in touch with your advisor and meet with him/her regularly.

#### Recommendation from Professors and Instructors in Humanities

Similar to the science recommendations, some schools require at least one recommendation letter from a faculty member in the humanities. MIT has a small humanities department, but take full advantage of the small humanities class sizes! There are several amazing humanities professors at MIT, from bestselling writers to Pulitzer Prize winners. However, keep in mind that a good recommendation comes from someone who knows you well, not someone who necessarily holds several accolades. Take humanities classes beyond the required English classes - try a class in political science, history, history of science, or foreign language. Humanities professors are very helpful and willing to write recommendation letters for students.

summer, you should try to complete the premed classes that are helpful for the test. See the MCAT section for more details.

- Narrow down your activities! Don't spread yourself too thin with too many activities. Medical schools are looking for well-rounded individuals who are very active and involved AND have solid grades. You don't want to do too many activities and then suffer in both your grades and your contributions to each of your activities. Try to get a leadership position to keep yourself involved and to demonstrate your commitment.
- Sign up for a prehealth advisor in the spring. See: <a href="http://web.mit.edu/career/www/preprof/advisors/html">http://web.mit.edu/career/www/preprof/advisors/html</a>

#### Summer after Sophomore Year

This is the first opportunity for you to take the MCAT. Students often ask if they should find a summer job if they are also taking the MCAT. The answer: some people do and some people don't, depending on how much prep time they need for this exam. Some people find MCAT to be too overwhelming for them to work full time as well, but some people find their summer jobs to be a good disciplinary tool—See the MCAT section for more information.

- This is the summer where you can potentially find good internships. Again, START EARLY!
- This is also a good time for you to start a UROP if you are going into medical research, or want to do a UROP for Project Lab (if you are course 7).
- There are many premed summer programs at other universities (Yale, Duke), but the deadlines for those are usually early February or March, or some as early as January. So do your research for these early in sophomore year. For a listing of summer programs, see http://web.mit.edu/career/www/preprof/medexplore.html
- Again, you can also choose to find a volunteer position.
- Consider shadowing physicians to get a sense of what medicine is really like. One way to find MIT alumni to shadow is to use the ICAN database: http://alum.mit.edu/cs/icam

#### JUNIOR YEAR: GET IN HIGH GEAR!

This is undoubtedly the most stressful and important year for you. You are taking advanced classes in your major, getting very involved with your ac-

tivities, and putting together your portfolio for medical school applications. Do not lose sight of your goals and keep up the good work!

Fall Semester

- -Think about your personal statement! We know it's early, but this is the part that applicants often have trouble with when it comes down to crunch time. What would you write on a blank page that shows something important about yourself and why you want an M.D. degree?
- -Make sure you applied for a Prehealth Advisor by now (apply for one through the Careers Office). The Careers Office cannot guarantee advisors to students who make their requests in the Fall semester. Developing a good relationship with your Advisor is critical to a strong application. Your Advisor is responsible for the recommendation that the med schools see first. Meet with your advisor as often as possible (at least 3-4 times total).
- -If you have not done so already, open a credential file with the Careers Office. This is where all your application materials (recommendations, MCAT scores, transcript, etc.) will be stored until they are ready to be sent to the med schools. Note that the Careers office is responsible for sending out your recommendation letters when the time comes. Read more about this at their website: http://web.mit.edu/career/www/preprof/credential.html
- -Start studying for the April MCAT (if you did not take it in August, or if you need to take it again).
- -Ask 3-5 people to write your letters of recommendation. Professors, employers, volunteer coordinators, student activity advisors, etc... Anyone who you think will give a positive, thorough, and honest evaluation of your experiences with them.
- -Continue to participate in extracurricular activities and volunteering opportunities that INTEREST YOU, and read up on some recent issues in health and medicine.

#### Spring Semester

- -The AMCAS application is available online in May. This is the common application accepted by almost all US medical schools. If you're applying to non-AMCAS schools, you will need to fill out separate applications.
- -Think hard, and draft your personal statement. Attend essay workshop offered by the Careers Office
- -Try to have all your application materials done by the beginning of June<sup>t</sup>. This is the first time you can submit your completed AMCAS (primary appli-

siasm about applying to medical school. This is also needed because your advisor is probably a very busy person so you want to schedule a meeting soon. Do not put this off until you start filling out your AMCAS! If you do not find your advisor to be helpful, inform the Careers Office immediately.

It is your responsibility to keep in touch with your advisor, especially because you want to establish a good relationship with him/her. You should try to meet with your advisor about one or two times a term, if not more. Part of establishing a good rapport is for you to voluntarily meet with your advisor often; this allows the advisor to come to know you better as a person, not just another advisee. Frequent communication is also a key. Reach an agreement with your advisor what the best method of communication. Keep your advisor updated with your activities, grades, and anything else that means a lot to you and will be helpful for your advisor to know when he/she writes the letter of recommendation.

Your premed advisor will write a letter of recommendation for you in your application file (see careers office). This acts as a cover letter and also a letter that fills in anything important but not mentioned in your other recommendation letters. This letter will be representing the MIT Premedical Advisory Board on your behalf, and this is the letter that the admission committees will

most likely read from your file. But this letter can do more than just fill in the cracks—if you advisor knows you well! Remember: these admissions committees are reading hundreds of files, so they want to read the most comprehensive letter first. This again shows you the importance of a strong relationship between you and your premed advisor!



'Believe me, I've had a heart attack this is not 'heart stopping'

#### Recommendation from Professors and Instructors in Science

Most schools require at least one, preferably two, recommendation letters from authors of science background. At MIT, these letters can be from your major advisor, UROP advisor, or a professor from your class. The key is, again, to establish a good relationship with the person you plan to get a recommendation letter from. Remember that in the letter you want to come across as not only a student who got an A in a class or performed well on a research project, but also someone who is intelligent, caring, and capable of going through medical school and becoming a physician.

#### Advisors & Recommendations

One of the most frequently asked questions about medical school application is: "How can I get great recommendation letters?" Establishing good rapport with your advisors and professors is the key! Throughout your MIT career there will be many different advisors, mentors, and professors. While you should have a good relationship with all your advisors, here are the most important ones with whom you should keep in touch. Also keep in mind that for medical school applications, in general it is recommended for you to have two letters from professors and advisors of science background, and at least one letter from a professor or instructor or advisor of humanities background.

#### Your Premed Advisor

Your premedical advisor can be your most helpful advisor in preparing for applying for medical school. Premedical advisors are professors, instructors, and physicians who know a lot about the premed track and who are willing to mentor and help premed students to get through the whole process smoothly.



"I'm a heart doctor with a kid in fourth grade art class, what can I say?"

You should apply for an advisor during the spring term two years prior to the year you plan to matriculate in medical school. For example, if you plan to enter medical school the September directly following your graduation, you should apply for an advisor in the spring term of your sophomore year. Because of an advisor shortage, sometimes it can take a while for you to be matched with an advisor.

Let the Careers Office know of any specific interests you have (i.e, if you plan to apply to MD/PhD programs, if you would like to do primary care) so that they can do their best in assigning you an advisor.

Please review the following web page for details on prehealth advisors: http://web.mit.edu/career/www/preprof/advisors.html

Once you have been matched with an advisor, contact him/her immediately and set up a meeting as soon as possible. This can help to show your enthu-

cation).

#### Summer after Junior Year

- -You will receive secondary applications from most of the schools you applied to 3-8 weeks after you send in the primary application. Secondaries are specific for each school, and each has its own set of new essay questions, etc (unlike the primary, which was the same for all AMCAS schools). Take as much time as you need to fill out these secondaries, but realize that many popular schools have a *rolling admissions policy*. That is, when they interview an applicant they want, they can choose to accept him/her right away. So the earlier you send in a secondary, the earlier you can get a potential interview, and the earlier you can be accepted. If you wait until the deadlines to do everything, you may be hurting your chances at these rolling admissions schools, since spots are filling up as time goes by.
- Once you have received secondaries and your file is complete, fill out a School Designation Form in the MIT Careers Office to have your recommendations sent to your designated schools. It is your responsibility to track that these materials have been sent, since mistakes can always happen when so much paperwork is involved.
- -Stay in touch with the Careers Office to make sure all your relevant application materials have been sent to your designated schools.

#### SENIOR YEAR: IT AIN'T OVER UNTIL YOU GET IN!!!

- Arrange shadowing opportunities with physicians if possible you want to continue to explore your motivation for becoming a doctor, and this can be helpful with your interview questions.
- Be informed about current issues in medicine, both in research and in public health topics—helpful with interviews.
- Continue with your activities.
- Research about financial aid options for medical school costs.
- Prepare for your interviews (see section on interviewing)! Arrange mock interviews with your premed advisor and the staff at the careers office. Attend workshops on interview techniques. Do your homework on the schools you are interviewing at!! Research in depth on these medical schools—academics, student life, faculty, curriculum, clinical years, financial options...

You want to have questions for the interviewers.

- Continue to be informed about current medical news
- Keep your premed advisor and the Careers Office updated with your progress
- Remember to thank your advisors and recommenders!
- It would be great if you can fill out the questionnaires provided by the Careers Office as a feedback for future MIT med school applicants. It would

#### Life Outside the Classroom: Get Involved

#### **UROP**

MIT premed students are encouraged but not required to conduct research during their undergraduate career. Fortunately, MIT provides and supports a unique opportunity for undergrads to become engaged in cutting-edge research. Students often wonder whether medical schools look for research experiences that are directly applicable to medicine. While research in the biomedical sciences may be a bonus to talk about during an interview or on the application, the type of research is not as important as your enthusiasm for your research. Medical schools specifically look to see if you have gained some critical thinking and problem-solving skills as a researcher. They are



"This happens every time we try to get free access to the Human Genome data."

more interested in the way your mind works when confronted with a problem. If these skills can be demonstrated within any context of research, you will have a definite advantage over others who do not have such experience.

So you want a UROP now. Keep a few things in mind: research because you are actually interested in the subject. Interviewers can tell if you were simply a glass washer or a reluctant lab robot. Your enthusiasm in your research not only inDehydration can make you feel tired and hungry. Bring a water bottle with you and keep it in your backpack so you can keep yourself hydrated during breaks in between sections. Leave early, even if you know where the testing center is. If you are driving, give yourself extra time in case of any problems on the road such as traffic or an unforeseen



road jam. If you are taking public transportation, also give yourself extra time for any connections or switching trains/buses.

Bring plenty of pencils with you, and don't forget the black pens for the writing section. Use ballpoint pens—the popular gel roller-type pens might not be waterproof. Who knows what those essay readers might have with them when they read?

#### At the Test Center

Relax! This is the most stressful time—all these other premeds have studied and are just as ready as you to take the test. It helps if you have friends taking the test with you, but if not bring a walkman/discman for some music or a fun book to read; there might be a lot of lag time before the test actually starts. Find a seat with ample lighting. If you are in one of those uncomfortable, dark lecture halls, try to sit up front for better lighting. Be prepared that the desks might be small.

#### During the Test:

BREATHE! Sometimes students are so caught up in taking the test they get way too stressed. The first few questions you read might mean nothing to you at all—that's okay, just move on, get used to the test, and you will start feeling better. If you blank out the first minute or two during the writing sample, don't fret! Remember the three things the graders are looking for in the writing sample, make a list, and start writing.

Remember not everyone has the same form of test, so when you chat with others during breaks you might not be talking about the same problems. Don't get all nervous for no reason! Stay focused. Don't think about how you have done on the last section but focus on the upcoming sections.

scores to differentiate them after a score of 13. Also, unlike the SATs, there is no penalty or deduction in points if you answer wrongly. Hence, if you don't know the definite answer, it doesn't hurt to guess. The writing section is scored on a scale of J through T. T is the highest score.

Should you release your score when you take the test?

Many people withhold their scores when they take the test. If you choose to withhold your score, remember that you will need to release the score and send additional reports to the Careers Office for your record as well as for AMCAS and non-AMCAS schools. If you release your score at the test, you can send the score report to six AMCAS schools without additional charge.

#### Taking the MCAT more than once?

Taking the MCAT more than twice is strongly discouraged. If you are unhappy with your first MCAT score and want to take the test again, you need to show improvements on your second test or else it may appear questionable on your file. Beware: the MCAT is a notoriously long test. Study well, and then you don't have to take it again.

#### The Day BEFORE the MCAT

Take a break! Do a little bit of review, but don't stress yourself out. Feel confident - if you have been studying and preparing well, you will do well on the test. If you don't know your material the day before the MCAT, you might want to rethink about taking the test the next day.

Go out for a nice dinner (with some carbohydrates as energy storage for tomorrow!), hang out with your friends, and get a GOOD night of sleep! Most test centers require you to be at the registration table by 7:30-8am, and don't forget to account for the travel time to the location. You might need to get up very early, and with a long day ahead you will need your rest. Don't forget to set your alarm!!

#### The Day OF the MCAT

THE DAY HAS COME! You have worked hard for the last few months, so don't let the last minute of stress and butterfly stomach get to you!

Don't snooze! This is not quite the day to feel like you have 30 minutes to sleep in (unless you have set your alarm a little early). You want to leave extra time in the morning for you to ease into the day. Have breakfast! As busy MIT students, most of us never have enough time in the morning to eat. But today will be a long day, and you need the little burst of energy from a good breakfast. Avoid too much carbohydrate; a good balance of proteins and carbo would give you a good start. Keep yourself hydrated.

creases your productivity and satisfies your curiosity, but it also gets that extra gold star from admission committees. Get to know your UROP mentor well. Keep him/her up to date on your progress and discuss how improvements can be made. The mentor often imparts sage advice on the secrets to doing good research. Ideally, in the end, you will have yet another strong recommendation for your file! Finally, you don't have to "publish" *per se* to win the hearts of the admissions committee. It's always nice if you have something substantial to show for your 13-odd months of lab, but remember, science is very fickle and even great researchers have to work long and hard to get publishable results. As long as you come out of UROP more like a scientist than before, you have fought half the battle.

#### COMMUNITY SERVICE

There are many opportunities to do community service at MIT. One time activities are often advertised through e-mails or posters around campus. However, you may want to choose one main service activity and dedicate yourself to it.

Hospitals are good places to volunteer. Most people volunteer a few hours a week, sometimes more. Opportunities vary a great deal - you can be assigned to read to children in the waiting room, be a greeter, or move supplies around just to name a few. Unfortunately, interaction with patients is often limited due to the inexperienced nature of the volunteer and issues of patient confidentiality.

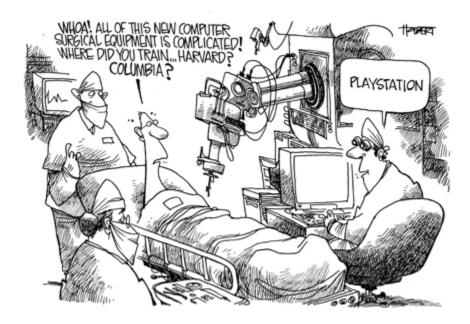
Volunteering does not have to involve medicine, however. Opportunities that require human interaction are a plus, because it is important for a doctor to be able to interact well with his or her patients. Teaching is a great way to interact with people. There are many programs on campus that can get you involved. The High School Studies Program (HSSP), SPLASH, ESP, LINKS (through the MIT Public Service Center), and Alternative Spring Break teaching trips are just a few ways to get started. In addition, the MIT Public Service Center has fellowships throughout the year and IAP that deal with teaching and helping out in Cambridge public schools. Working in soup kitchens, homeless shelters, and nursing homes are other alternatives. Other activities may include Habitiat for Humanity, Project HEALTH, and CommuniTech (you can find out about all these actitivies through the MIT Public Service Center).

Keep in mind that you should not choose to volunteer somewhere just because you will think it will look good on your resume and med schools will like it. You should be volunteering because you want to, and that way, you and

the people you are helping will benefit the most.

#### STUDENT ACTIVITIES

MIT offers a unique and eclectic variety of student groups: academic societies, arts groups, ethnic/language groups, independent living groups and Greeks fraternities and sororities, political organizations, publication groups, religious groups, student government organizations, etc. With the choice of joining any of these groups, one may wonder which activities are favored by medical schools and which aren't. In many ways, this is the wrong approach to take on deciding which activities to do during your undergraduate career. The most important thing to remember, as medical school admissions counselors often state, is to participate in activities that interest you and make you happy—that keep you balanced with your academics. Your extracurriculars should round out your overall curriculum. For example, if your course of study is in the sciences, you might want to keep up participation in theater, the yearbook, or student government, just a few of many examples.



Biological Sciences: Among the classes you should take are 7.012 or 7.013 and 7.05. There aren't many MIT biology classes that would actually help you on the MCATs. Since the MCAT covers mostly introductory topics, however, you shouldn't worry about it. MIT tends to stress different aspects of biology (such as molecular biology, genetics) than the MCAT does. The MCAT has a lot of anatomy and physiology which are not covered in MIT's introductory bio classes. However, these topics usually just require memorization and are not too hard to pick up. This section also covers organic chemistry; 5.12 and 5.13 are strongly recommended as preparation for this section. 5.12 is probably sufficient, but 5.13 really makes you know your organic chemistry well and is highly recommended by your peer premed students.

#### MCAT preparation classes?

Many students choose to take MCAT preparation classes. Though they may be quite pricey, they give you materials that specifically target all topics covered on the test so that you don't have to guess. Plus, practice is key to doing well on the test, and these courses give you plenty of that.

Take, for example, Kaplan: For their summer course, they have you take a full length MCAT every weekend for five weeks before the actual test day. Now, the thought of sitting through a 7 hour exam five times before taking the real one might make you want to puke, but trust us, it really helps in the end. When test day comes along, you will be so used to the whole deal, that the test will seem shorter than it actually is.

A couple test prep courses also hold their classes right at MIT. This is extremely convenient for people staying around during the summer. However, there are also plenty of places all over the US where classes are offered if you don't happen to be in the Boston area. Finally, if you are an extremely disciplined person who doesn't need feedback for wrong answers or on essays, then the test prep courses aren't really necessary. But for many of us, this is not the case...

#### How is the MCAT scored?

The MCATs scores are curved. That's right - you are going to be compared to the other students who are taking the test the same time you are. There are 3 sections: each section is graded on a scale of 1-15, with 15 being a perfect or nearly perfect score. These three sections are combined for at theoretical high score of 45. However, for a few years now, there have been many people scoring sufficiently high on the verbal section to cap the maximum score at 13, since there wasn't enough of a difference between the numerous high

Should I get a job and take the MCAT in the summer? Some people find that having a full time or a part time job keeps them disciplined in terms of studying. Having a full time job might mean you will be working 9 to 5, maybe attending a prep class from 6 to 9, and then go home to study more or crash. However, work keeps you on a regular schedule and makes you aware that you cannot procrastinate on weeknights if you want to relax on weekends, etc. Part time jobs are great, and some people choose to volunteer instead of working for pay.

April MCAT. The obvious downside to taking the MCAT in April is that school is in session. Depending on the classes you are taking in the spring, studying for the MCAT at the same time could be overwhelming. But many people still take it in April and, with good time management and preparation, do very well on the test.

#### Where should you take the MCAT?

Where you want to study and take your MCAT largely depends, obviously, on what you are doing besides MCAT in the summer. What might come as a factor in consideration is the number of people taking the MCAT. For example, Boston testing location will host nearly two hundred students for the MCAT, whereas a testing center in a smaller suburb may only host twenty or thirty students. Where you can study better is also an important factor for some people. Some students study better at home over the summer because of less distraction, but some find more distractions at home because of old friends and gatherings.

What materials are covered on the MCAT? What premed classes are beneficial in preparing for the MCAT?

*Physical Sciences:* Any flavor of the 8.01, 8.02 set and 5.11. The physical science section tests your knowledge on general chemistry (not organic), classical Newtonian physics, and electricity and magnetism (non-calculus based). These subjects are all sufficiently covered in the classes listed above. In fact, you may find that the physical sciences section on the MCATs is suprisingly laid back when you compare it to what you did in 8.01 and 8.02! Calculators are not allowed at the MCAT, so learn to efficiently estimate.

Verbal Reasoning: There are really no classes at MIT that will prepare you for this section. Remember the SATs? The verbal reasoning is just like the reading comprehension section of the SATs, only harder. Good preparation for this section should include reading newspapers such the New York Times and the Wall Street Journal or magazines such as Scientific American. Try to read a little every week and read for content and comprehension - don't just skim and glaze!

#### THE MIT PREPROFESSIONAL ADVISING OFFICE

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The MIT Preprofessional Advising Office (a part of the Careers Office) is an essential stop for all premeds at the Institute. The office provides numerous services for applicants (undergraduate, graduate, and alumni).

#### Credential Service: File for Medical School Application

The Careers Office designed the Credential Service as a convenient means of organizing and distributing letters of recommendation, transcripts and test scores for MIT students and alumni applying to medical school. To open this portfolio, fill out the Credential Service form. Generally, students open a file during the spring semester of their sophomore year if they intend to enter medical school upon graduation. The service charge is \$60. The Careers Office will send recommendation packets to a maximum of 15 schools. Each additional school costs \$6 more.

#### Premedical Advisors

The Careers Office recruits faculty, physicians, and research affiliates to serve as premedical advisors. These volunteers are an excellent source of information, advice, and insight. Students interested in applying to medical school should apply for a premed advisor during two years prior to their intended matriculation year. (See the Advisors and Recommendors section)

#### Resources & Workshops

The Careers Office also offers other helpful services: walk-in hours to answer quick questions, mock interviews, workshops useful to premeds. These workshops have included topics such as: the personal statement, interview techniques and the medical school application process. The office also hosts medical school admissions sessions. Advanced signups are required for most workshops and events.

#### Premedical mailing lists

Through listservs, the staff sends important reminders and useful information to all premed students. Opening a credential file puts you on the premed email list.



# Taking the August MCAT?

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#### MCAT: MEDICAL COLLEGE ADMISSIONS TEST

Most people shudder at the thought of MCAT (medical school admissions test). MCAT is a standardized test designed to assess medical school applicants' knowledge and reasoning skills. The test has four sections: biological science, physical sciences, verbal reasoning, and a writing sample.

#### When should you take the MCAT?

MCAT is offered in April and August every year. Students who intend to attend medical school right after graduating from college should take the MCAT by August after junior year at the very latest. However it is recommended that students take the test the August after sophomore year. Be aware that MCAT scores are good for three years; if you want to take time off (for more than a year) between graduating from college and applying medical school, you should take the MCAT later so that you don't have to take the MCAT twice.

#### April or August?

You should take the MCAT when you feel you are ready to do well on the test. There are advantages and disadvantages in taking the MCAT in either April or August:

August MCAT. Many MIT students choose to take the MCAT in the summer, usually the summer after sophomore year. Taking the test in August means that you don't have to worry about studying MCAT while attending classes and completing exams, papers, and projects for classes. Taking advantage of the fact that MIT is not in session can help you concentrate in studying for the test. If you are not working full time in the summer, you will also have a lot more free time to study for the test.

Now, the disadvantage: it is very tempting to procrastinate in the summer. Depending where you are in the summer, you might have friends in the area who are eager to enjoy the weather and have fun. Since you have more free time in the summer, you will be tempted to say: "It's okay if I don't study tonight since I have all week." Don't get us wrong—you should NOT study 24 hours a day for the MCAT. You need to take breaks and go out with your friends as a way to relieve the stress too. Just watch out for that little worm of procrastination and don't let it get to you too much, especially the few weeks before the MCAT.