# The MCAT

Montana WWAMI Pre-Med Conference

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Medical College Admission Test

- Sponsored by the AAMC (www.aamc.org)
  - Association of American Medical Colleges
  - **BEST** source of information

- Purpose: To measure your knowledge and application of science concepts, problem solving skills, critical thinking, and the human condition.

MCAT is only <u>one</u> part of your admissions process
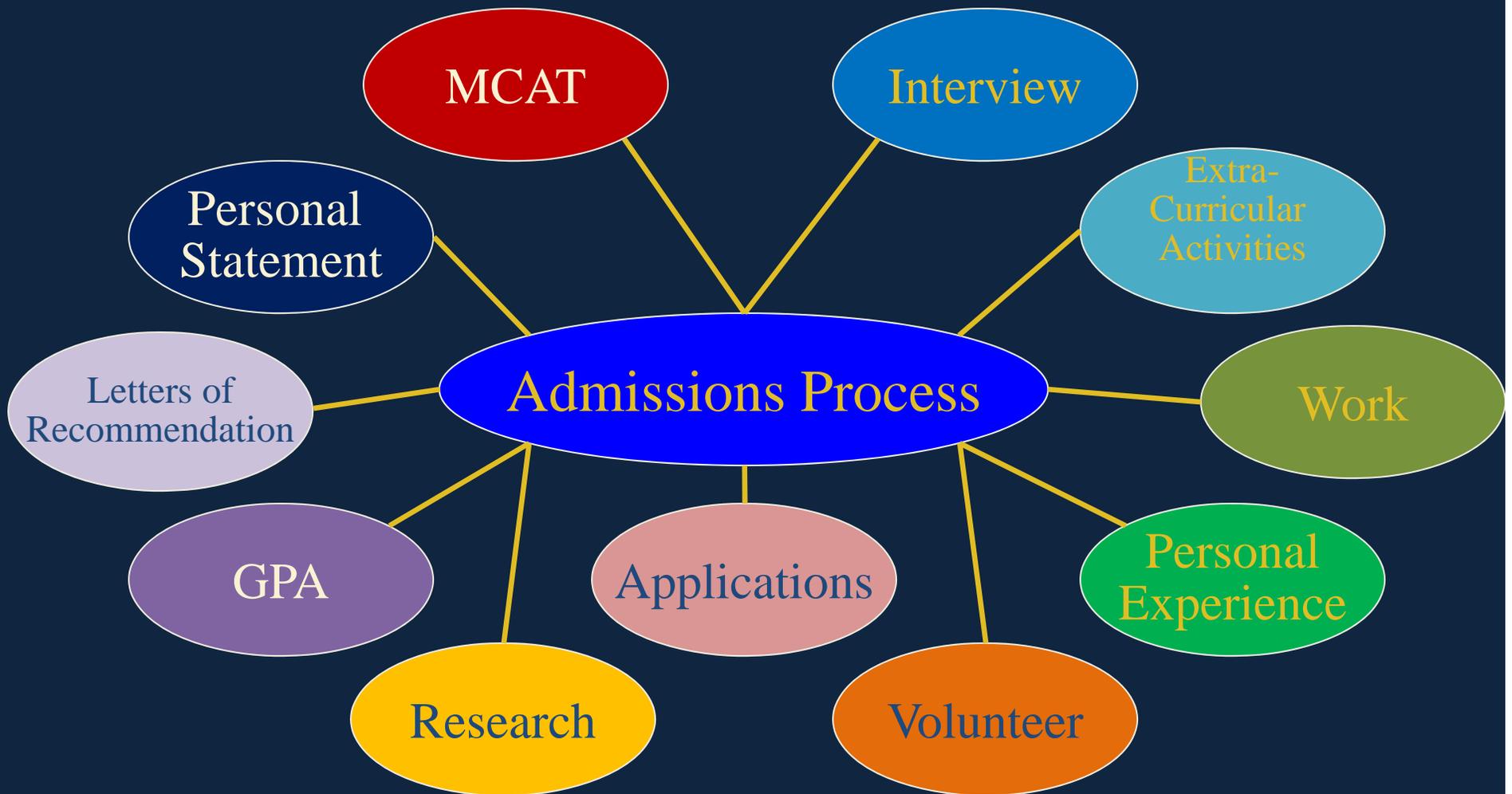
Introduction

- MCAT has been used in the medical school admissions process for more than 60 years.
  - Provides mechanism to:
    - identify applicants more or less likely to experience academic success
    - Assess specific strengths and weaknesses
    - Interpret transcripts and letters of recommendation

- About 100,000 exams were administered in 2017.

- Fully computerized since Jan 2007

- Content review and update about every 15 years.
  - MCAT 2015 version released after several years of development (HHMI-AAMC collaborative report on competencies)

Desirable characteristics of medical students and physicians (holistic review):

– intellectual ability: not necessarily = to academic record
– commitment/service
– cultural sensitivity
– empathy/compassion
– capacity for growth
– emotional resilience
– strength of character
– interpersonal skills
– curiosity and engagement

Medical schools would like...

- Ability to integrate info and large data sets
- Critical thinking
- Logical reasoning
- Scientific reasoning
- Verbal reasoning
- Biology
- Written/oral communication
- Cell Biology
- Integrity
- Professionalism
- Biochemistry
- Organic Chem
- Maturity
- Intellectual curiosity
- Genetics

Test Structure

Topic	Questions	Time
Examinee Agreement		4 min
Tutorial *(optional)*		10 min
Chemical/Physical Foundations	59	95 min
Break *(optional)*		10 min
Critical Analysis	53	90 min
Mid-Exam Break *(optional)*		30 min
Biological/Biochemical Foundations	59	95 min
Break (optional)		10 min
Psychological/Social Foundations	59	95 min
Void Question		3 min
Satisfaction Survey (optional)		5 min
Total Content Time		6hr 15 min
Total Seat Time		7hr 30 min

~96 sec/Q (compared to 78 sec/Q on old exam)   Former seat time 5hr 25 min

Chemical and Physical Foundations of Biological Systems

- First Semester Biochemistry   25%
- Introductory Biology   5%
- General Chemistry   30%
- Organic Chemistry   15%
- Introductory Physics   25%

- 59 questions
- 10 passage based sets of questions, 4-6 questions per set
- 15 independent questions

Critical Analysis and Reasoning Skills

- Humanities and Social Science Disciplines
  - Population health
  - Diverse cultures
  - Ethics
  - Philosophy

- No specific background information needed

- 53 questions
- 9 passages, 5-7 questions each

Biological and Biochemical Foundations of Living Systems

- First semester Biochemistry   25%
- Introductory Biology   65%
- General Chemistry   5%
- Organic Chemistry   5%

- 59 questions
- 10 passage based sets of questions, 4-6 questions per set
- 15 independent questions

Psychological, Social, and Biological Foundations of Behavior

- Introductory Psychology   65%
- Introductory Sociology   30%
- Introductory Biology   5%

- 59 questions
- 10 passage based sets of questions, 4-6 questions per set
- 15 independent questions

New Score Scale

125
TOP OF THE CURVE
118 — 132
Chemical and Physical Foundations of Biological Systems

+

125
TOP OF THE CURVE
118 — 132
Critical Analysis and Reasoning Skills

+

125
TOP OF THE CURVE
118 — 132
Biological and Biochemical Foundations of Living Systems

+

125
TOP OF THE CURVE
118 — 132
Psychological, Social, and Biological Foundations of Behavior

=
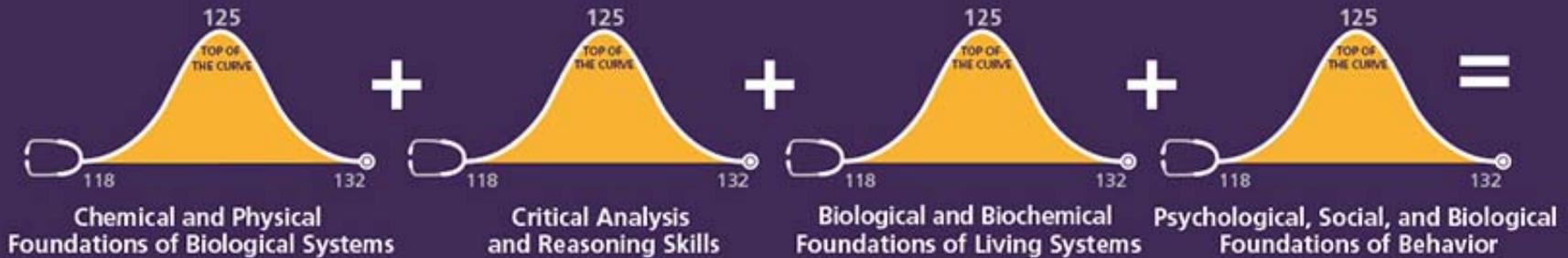
MCAT2015 Total Score

500
TOP OF THE CURVE
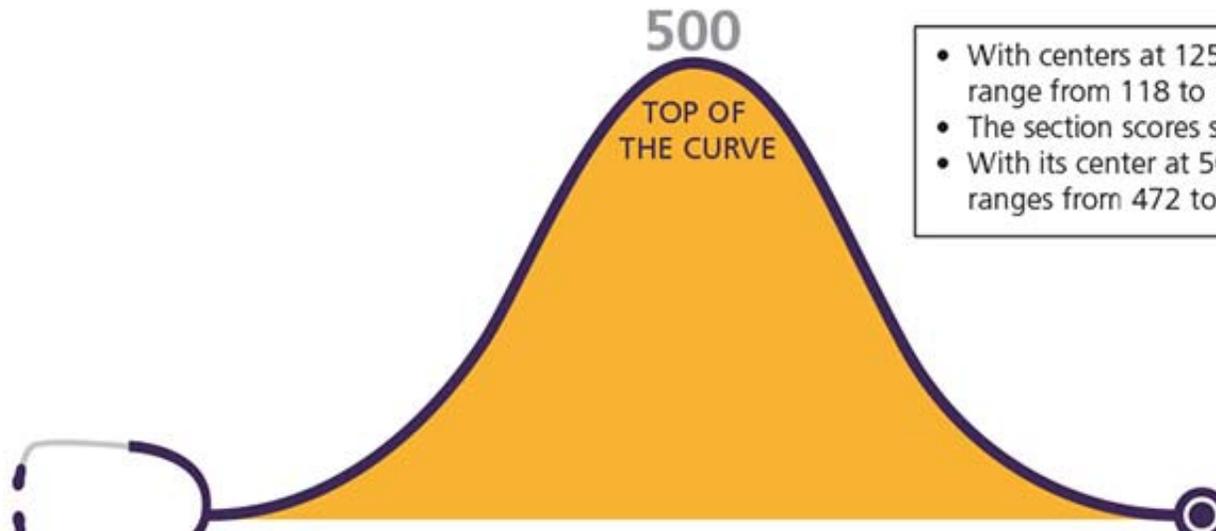
- With centers at 125, section scores range from 118 to 132.
- The section scores sum to the total score.
- With its center at 500, the total score ranges from 472 to 528.

Preparing for the MCAT

- Know your own style ! ! !
  - group or solo
  - how long is an appropriate time for prep
  - do you need the motivation provided by outside sources (online or otherwise)

- Use AAMC resources –
  - free online information
  - The *Official Guide to the MCAT Exam*
  - Take at least one practice test online in similar conditions as you would the real test (i.e. at a library or in a classroom).

- Use course notes, textbooks, exams, etc
  - most of what you need to know you have already learned

- Practice (aamc.org)   Practice   Practice

Preparing for the MCAT

- Scientific competency involves fundamental principles in biology, gen chem, Ochem, physics, biochem.
  - Advanced sciences courses are not likely to improve your score.

- CARS passages contain all the information you need.
  - Participation in a variety of courses (humanities) will enhance performance – critical thinking and reasoning skills.

- Official Guide to the MCAT

- AAMC/Kahn Academy Partnership – over 1,100 content videos -- ** FREE **

- AAMC Sample test, 2 practice tests & 3rd released Nov '17

- Other (how do you decide)
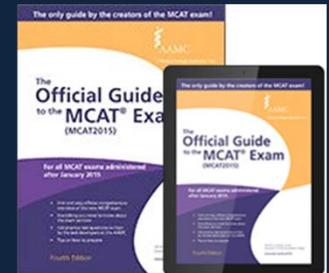
Registration

- First come-first served, plan ahead and note 2 step process
  - sites include Billings and Helena *** surveys, emails***

- Jan- June dates - registration opened Oct 18
- July- Sept dates - registration will probably open in Feb

- During registration, enter your name *EXACTLY* as it is on your (unexpired) ID

- Make sure your email address is correct and *current*

- If you need your score this year, don't plan on a Sept date
  - Some schools don't accept
  - If you have problems, there is no time to reschedule

- Scores are returned in 30-35 days
  - plan accordingly

Costs (2017)

- Gold: ~ month before exam
  - $315 Registration
  - $90 change fee
  - Cancellation refund ($155)

- Silver: 2 weeks before exam
  - $315 Registration
  - $150 change fee
  - NO refund

- Bronze: 1-2 weeks before exam
  - $370 Registration
  - NO change allowed
  - NO refund
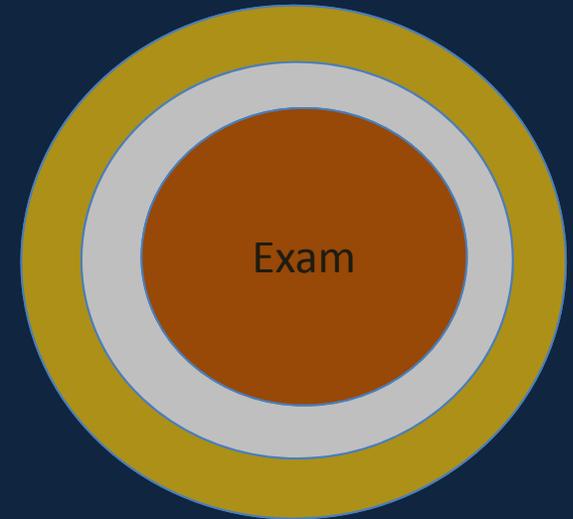
Exam

Registration

- You can take up to 4 exams in two years or 3 in one year
  - In 2017, 12% of examinees took exam twice, 1% took three times

- You can only register for 1 at a time

- Score release
  - AAMC automatically – and all AMCAS participating schools to which you apply
  - Health Professions Advisor
  - Med-MAR – for disadvantaged or under-represented minorities only
  - MCAT recruiting service – schools may use info to send you recruiting materials.

- MCAT Testing History (THx) system
  - Your access to scores
  - May request score release to entities other than AAMC/AMCAS

- Fee assistance programs are available – Apply early !!
  - 300% of the poverty level
  - Good for two years, but only one application cycle

Test Day

- Arrive early –
  - eat well and pack nutritious snacks
- If traveling:
  - If not familiar with location, find ahead of time.
  - Stay locally, exams start at 8am and you will be exhausted by the end. Arrive 30 min early
- ID – government issued with name, photo, expiration date.
  - name must be EXACTLY as you registered! Palm scan this year
- Items allowed in room:
  - ear plugs, unopened (meds/food for medical purposes, must have accommodation)
  - scratch paper, ear covers, pencils will be provided
- Clothing
  - Plan. Room temp may vary – how can you be comfortable. Hats may need to be removed. Extra layer may not be allowed.
- Use breaks to stay nourished, alert and energized.

Exam tips

- Practice –
  - know the key strokes – there are changes this year – practice will be released in December

- Know the parts of the exam-
  - Non disclosure Agreement defaults to 'NO' -
    - you will not be allowed to take exam if you don't answer.
  - Void exam question defaults to 'YES'
    - your exam will be scored

- Have contact info with you
  - testing center phone #
  - AAMC (202) 828-0690, esp for ID issues

- Problems should be reported to Test Center Administrator and in writing to AAMC within 5 days.

To retake or not to retake?

- Discrepancy between GPA and MCAT score
  - or between practice and real MCAT scores
  - AAMC recommends NOT to retake if score is 28 or higher.

- Course work experience was inadequate
  - finish recommended course work and retake

- Technical problem
  - be very well prepared, know instructions, sign-in requirements, etc
  - sometimes things will still go wrong and the AAMC may or may not be able to assist.

- Personal disruption
  - illness
  - travel complications
  - etc

Evaluation of retake scores

- Schools vary in their approach to interpreting multiple scores

- The recommendation to schools last year was to consider the average

- But...
  - look at all and note improvements
  - consider only the most recent
  - average ALL scores
  - use only highest score
  - use highest score from each section

Questions ?