PRE-OPTOMETRY FACT SHEET

PREREQUISITE & RECOMMENDED COURSES
Pre-optometry students who complete the following courses should be well-prepared to apply to a large percentage of optometry programs. Students are encouraged to research individual optometry programs to ensure they are aware of all prerequisite courses and other admissions policies.

PREREQUISITES MOST OFTEN REQUIRED BY OPTOMETRY PROGRAMS
- General Biology I & II w/ Labs - 8 hours - BIO 201/205 & BIO 202/206
- General Chemistry I & II w/ Labs - 8 hours - CHM 203/204 & CHM 205/206
- Organic Chemistry I & II w/ Labs - 8 hours - CHM 321/322 & CHM 323/324
- General Physics I & II w/ Labs - 8 hours - PHY 201/205 & 202/206
- Biochemistry - 3 or 6 hours - CHM 371 or CHM 383 & CHM 384 (Biochemistry majors)
- Microbiology - 3 hours - BIO 350 (non-BIO majors) or BIO 452/453 (BIO majors)
- Physiology w/ Lab - 4 hours - BIO 449/450 or EXS 320
- Human Anatomy w/ Lab - 4 hours - EXS 331 or PHA 310/311
- Calculus - 3-4 hours - MTH 231 or MTH 245
- Statistics - 3 hours - Many options
- Psychology - 3 hours - PSY 201
- English - 6 hours

ADDITIONAL RECOMMENDED COURSES
- While many optometry programs may accept AP/CLEP/IB, dual-enrollment, or community college courses to meet prerequisites, applicants should research individual schools to be certain of their admissions policies.

CO-CURRICULAR EXPECTATIONS

LEADERSHIP & TEAMWORK
Students must demonstrate leadership and interpersonal skills. Consider initiating group projects, serving as an officer in a student organization, or working as a teaching assistant. Students must also demonstrate the ability to work collaboratively. Group projects within classes, team sports, and working on a research team are just a few ways to demonstrate this ability.

VOLUNTEER & SERVICE
It is important to demonstrate sustained commitment over time. Students should have service experiences in healthcare and non-healthcare settings. Check out the Schlegel Center for Service and Justice for opportunities: blogs.creighton.edu/ccsj

HEALTHCARE EXPERIENCE
Students should seek opportunities for hands-on, direct patient care experience. This can be gained through volunteer positions in healthcare settings or through employment. Examples of employment include optometric assistant, CNA, EMT, phlebotomist and home health aide.

SHADOWING
Students must gain knowledge of the profession by shadowing professionals in their field. Students should shadow practicing optometrists to gain an understanding of the profession and its day-to-day responsibilities.

RESEARCH
Research experience is not a requirement for admission to optometry programs, but may add an extra layer to an application if the student is interested in research. See the Center for Undergraduate Research and Scholarship for opportunities: www.creighton.edu/curas

BECOMING A COMPETITIVE APPLICANT
Applicants to optometry school must complete a minimum of 90 credit hours (three years) of college coursework, which includes the pre-optometry prerequisites. Most pre-optometry students complete bachelor’s degrees prior to entering optometry school. Competitive applicants for admission have solid academic records, well-rounded profiles of co-curricular experiences, strong scores on the Optometry Admission Test (OAT), supportive letters of recommendation, and can clearly articulate their reasons for choosing optometry.

SELECTING A MAJOR
Students are encouraged to choose a major where they can demonstrate strong overall academic performance, while also focusing on developing a solid foundation in the sciences. Ideally, a major should be based on student interests and should support an alternate career. Optometry schools look for students who demonstrate the academic ability to handle rigorous course loads.

GRADES & GPA
C is an honorable grade. However, grades below B, especially within the two academic years leading up to optometry school application, could interfere with admission. Faced with a likely grade below C, some students should withdraw (W) and later try for a higher grade. Students should consult with advisors as they decide. More than two W’s could indicate a lack of judgment or an inability to handle challenges in optometry school.

GPAs calculated on optometry school applications include coursework done at all colleges attended and all attempts at a course.

Aim for GPAs of 3.3 or above.

CREIGHTON PRE-HEALTH RESOURCES
Pre-Health Advisors in the Center for Advising Resources & Support are available to meet with students individually about their pre-health goals and path.

The Pre-Professional Communities assist students in exploring the optometry profession, gaining experience in healthcare, and preparing for the application process. Students should participate in PHLC 200 in their sophomore year. Students are encouraged to participate in PMED 300 as guests during the junior or senior year, as the preparation process for optometry school is similar to the process for medical school.

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COURSE SCHEDULING CONSIDERATIONS

Freshmen and sophomores usually take only two natural science or math subjects each semester.

Chemistry: General Chemistry I (CHM 203/204) and General Chemistry II (CHM 205/206) are typical choices for freshman fall and spring. To be eligible to take General Chemistry in the freshman year, students must achieve a sufficient score on the Quantitative Assessment for New Students (QANS). Students who do not achieve a sufficient QANS score will need to complete an introductory chemistry course, CHM 105, with a grade of "C" or better to progress to CHM 203.

Biology: General Biology I (BIO 201/205) and General Biology II (BIO 202/206) are typical choices for freshman fall and spring. Completion of either General Chemistry I (CHM 203) with a grade of "C" or better or Introductory Chemistry (CHM 105) with a grade of "B" or better is required in order to take General Biology II.

Physics: Students who have sufficient math and physics (a year of high school physics or a semester of college introductory physics, math through pre-calculus) are eligible to take General Physics I (PHY 201/205) and General Physics II (PHY 202/206). Prospective math, physics, and chemistry majors may take alternate sections of General Physics and additional math.

Math: Pre-optometry students are required to complete a calculus course. This requirement can be fulfilled by either MTH 231 or MTH 245. Math, physics, and chemistry majors will need more than one semester of calculus, and should take MTH 245.

Summer: Science courses may be taken in the summer, but only when there are good reasons for doing so (not just a vague desire to "catch up") and not at community colleges. Speak with a Pre-Health Advisor about timelines.

Sample First Semester Schedule
*Course sequencing may vary depending on a student's readiness*
- General Biology I w/ Lab (4 hours)
- General Chemistry I w/ Lab (4 hours)
- Magis Core Class (3 or 4 hours) - ENG or Critical Issues & COM 101
- Magis Core Class (3 hours) - PHL or THL
- Maybe another Magis Core Class (3 hours) - PSY, SOC or Foreign Language
- RSP Class (.5 hours)

OPTOMETRY SCHOOL APPLICATION PROCESS

ADMISSION TESTS
Optometry programs require the Optometry Admission Test (OAT). Students typically take the OAT approximately 12-15 months before starting an optometry program. To do well on the OAT, students must complete the appropriate pre-optometry courses and allow themselves time for significant study and preparation.

OPTOMETRY CENTRALIZED APPLICATION SERVICE (OptomCAS)
Students apply to optometry programs using OptomCAS. Students submit information that is transmitted to all programs they apply to, as well as program-specific information that goes to individual schools. OptomCAS opens annually in June for the new application cycle.

LETTERS OF RECOMMENDATION
Students must submit at least two (and up to four) letters of recommendation. Students should obtain at least one letter from a professor who taught the student in a science course. A letter from an optometrist may be required or recommended. Research individual schools for letter requirements.

INTERVIEWS
Many optometry programs will interview promising applicants. The John P. Fahey Career Center offers interview preparation assistance, including mock interviews.

PRE-OPTOMETRY GROUPS & RESOURCES

PRE-OPTOMETRY CLUB
All pre-optometry students should participate in the Pre-Optometry Club. This student organization provides leadership opportunities to explore and gain experience in the optometry profession:
https://cuinvolved.creighton.edu/organization/pre-optometry

OPTOMETRY PROGRAMS
There are 23 Association of Schools and Colleges of Optometry (ASCO) member schools in the United States and Puerto Rico. A list can be found on the ASCO website.

HELPFUL LINKS
- Association of Schools & Colleges of Optometry | optometriceducation.org
- OptomCAS | optomcas.org

Creighton University
Center for Advising Resources & Support
Hixson-Lied Science Building G06
CARS@creighton.edu