

Student Name: _____
Graduation Year: _____
Major 1: _____
Major 2: _____
Major 3: _____
Minor(s): _____
Academic Advisor(s): _____

Student ID: _____

Hometown: _____
Concentration: _____
Concentration: _____
Concentration: _____

Goldwater Scholarship

Award Details:

Emphasis:

Academic

Research

Language

Experiential

International

Brief Description:

The Barry Goldwater Scholarship and Excellence in Education Foundation was established by Congress in 1986 to serve as a living memorial to honor the lifetime work of Senator Barry Goldwater, who served his country for 56 years as a soldier and statesman, including 30 years in the U.S. Senate.

By providing scholarships to college sophomores and juniors who intend to pursue research careers in the natural sciences, mathematics and engineering, the Goldwater Foundation is helping ensure that the U.S. is producing the number of highly-qualified professionals the Nation needs in these critical fields. Over its 30-year history, Goldwater Scholarships have been awarded to thousands of undergraduates, many of whom have gone on to win other prestigious awards like the National Science Foundation's Graduate Fellowship, Rhodes Scholarship, Churchill Scholarship and the National Defense Science and Engineering Graduate Fellowship that support our Scholars' graduate school work. Today, Goldwater alumni can be found conducting research that is helping defend the Nation, finding cures for catastrophic diseases and teaching future generations of scientists, mathematicians and engineers.

Scholarships of up to \$7,500 a year are provided to help cover costs associated with tuition, mandatory fees, books, room and board. A sophomore who receives a Goldwater Scholarship will receive up to \$7,500 in each of his/her junior and senior years. A junior who receives a Goldwater Scholarship will receive up to \$7,500 in his/her senior year. Students who receive an Honorable Mention do not receive financial support.

Can The Award Be Deferred? Yes

Can The Award Be Renewed? No

Scholarship Conditions

A Goldwater Campus Representative with the Foundation may nominate up to four students annually. No direct student applications or nominations by campuses without a Goldwater Campus Representative will be considered.

To be eligible for nomination for a Goldwater Scholarship, a student must:

1. Be a full-time matriculated sophomore or junior pursuing a degree at an accredited 2- or 4-year institution of higher education during the present academic year
2. Intend to pursue a research career in a natural science, mathematics or engineering (See Table)
3. Have a college grade point average of at least a 3.00 on a 4.00 scale
4. Be a U.S. citizen from the 50 states or the District of Columbia; a U.S. national for those students nominated by institutions in Puerto Rico, Guam, Virgin Islands, American Samoa, and Commonwealth of the Northern Mariana Islands; or a permanent resident. A permanent resident nominated for the scholarship must include a letter stating his/her intent to become a U.S. citizen. A photocopy of the nominee's Permanent Resident Card, also known as the Alien Registration Card or Green Card, must also be submitted.

While research in medicine is not supported by the National Science Foundation, students interested in pursuing careers in medicine or veterinary medicine are eligible for a Goldwater Scholarship if research is a central part of the student's career goals.

Eligibility:

Applicant Education Level:	Sophomore or Junior Undergraduate
Open to (Non-US) International Students:	Some – Must be Permanent Resident of U.S. with intent to become a citizen
Required to Demonstrate Financial Need:	No
Specified Majors:	Natural Sciences, Engineering, Mathematics
Minimum GPA:	3.0

Candidate Profile: Key Characteristics Sought By Review Committee

- Involvement in research as an undergraduate is highly desirable
- Average GPA of recipients is a 3.9

Selection:

Number of Candidates Awarded Each Year:	250
Interview:	Not Required
Approximate Date Selected Candidates Are Notified:	Last Friday in March

Contact Information:

Name:	Ms. Lucy Decher
Position:	Executive Administrator
Street Address:	6225 Brandon Avenue, Suite 315
City / State / Zip:	Springfield, VA, 22150
General E-mail:	Goldwater@ScholarshipAmerica.org
Phone:	703-756-6012

Information Sessions:

Webinars for Candidates:	No
Webinars for Advisors:	No

Website:

Official Website:	https://goldwater.scholarsapply.org/
Additional Information:	https://goldwater.scholarsapply.org/scholarship-awardees/

Application:

Date Application is Available:	First Tuesday After Labor Day
Application Due Date:	Last Friday in January at 5:00pm CT
Application Must Be Submitted By:	Advisor on behalf of the candidate
Institutional Endorsement Required:	Yes
Institutional Cover Letter Required:	No

Online Application:

<i>The application includes the following steps:</i>		Deadline	Date Completed
Complete a Student Profile and pre-application ¹		1/26/2017	_____
Online Questionnaire ²		1/26/2017	_____
Research Essay ³		1/26/2017	_____
Three Letters of Recommendation ⁴		1/26/2017	_____
Name	Position	Date Notified	Date Completed
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____
Transcripts ⁵		1/26/2017	_____
Permanent Resident ⁶		1/26/2017	_____

1. After identifying the Goldwater CR, please complete the Student Profile and Goldwater Scholarship Pre-Application. When submitted, these materials will be sent to the institution's Goldwater CR. Upon completion of a Pre-application review, the CR will contact the student to inform the student of the outcome of the review. If accepted, the CR will provide the student with additional campus-specific application information and provide the student with access to the online Goldwater application. For those not being moved forward in the application process, the CR will provide a brief explanation for the decision. Should a student not hear from his/her institution's CR, contact with the CR should be attempted at the email address or telephone number provided in the Locator. If unable to contact the CR, contact should be made with the Goldwater Help Center at 507-931-8335 or by email: goldwater@scholarshipamerica.org.

2. The online questionnaire, in addition to gathering background academic information, seeks to help the Goldwater Foundation understand a student's commitment to pursuing a research career, intellectual intensity and potential for making a significant future contribution to research in one of the Goldwater eligible fields. A copy of the online questionnaire may be viewed or printed by clicking on the appropriate link. Applicants are encouraged to review this material prior to beginning the application as it clarifies the information that will be needed to complete the online questionnaire and short essays.

3. The Research Essay provides reviewers with particularly important insights into an applicant's background, experience, skills, and interest in pursuing a research career. The strongest Research Essays are typically based on prior or current research experience. The Research Essay should include:

1. Description of the issue or problem
2. Discussion of the research methodology
3. Discussion of the student's findings.

It is very important that the essay details the student's specific contributions to the project and indicate the specific skills/expertise the student developed as a result of participation in the project. To demonstrate that the applicant "thinks like a scientist," the essay might, as an example, describe future work the experimental data suggests or describe an entirely new work that is based on the skills and insights the student learned from the experience. A student who has had research experience may, of course, choose to write about something other than work he/she has previously done. In this case, if applicable, the student might discuss how the previous work has influenced the proposed work and/or provided the student with applicable skills. If a student has not been involved in a research project, the student can develop a Research Essay on a "proposed" research project that might, for example, be based on an independent investigation of theory or on a topic of interest in the student's field. In such cases, a research problem should be put forward. Include an idea for a research protocol that would address the problem, a discussion of methodology, and anticipated results. Linking the project to the skills the student has acquired through coursework or other work would be helpful to the reviewers. The Research Essay should include appropriate bibliographic information and references.

Research Essay Formatting Guidelines:

Research Essays should be single spaced and use 12 point or larger Arial font. Margins should be 1 inch on all sides. Page length, including bibliographic information and references, must not exceed 3 pages. The Essay must include the applicant's name and the name of the nominating institution in the header of each page. Single or double column format may be used. As appropriate, utilize graphs, tables, and figures in the essay to explain or clarify results. Research Essays should be saved as PDF files. Although the upload site accepts JPG and PNG file formats, PDF files are preferred. Students are responsible for uploading the Research Essay.

4. Early in the process, the Goldwater CR will discuss with each applicant the selection of three appropriate Recommenders. These should be individuals who know the student's academic and research strengths and weaknesses well. Those who have served as faculty mentors for a student on a research project are among the student's most important references. Letters can also come from faculty or post-docs who may not have served as the student's research mentor but have interacted with or observed some aspect of the student's research work. Letters from faculty who know a student well from the student's science, math or engineering classes, particularly those who can relate course materials to the student's research career interests or who can comment on the student's research aspirations, are also among the group of appropriate letter writers. Evaluations from former high school teachers, coaches or family friends are generally of minimal value.

5. Transcripts from all colleges and universities a student has attended that are being used to compute the student's cumulative Grade Point Average (GPA) must be submitted as part of the application unless all the classes a student has taken at other institutions, along with the grades for these classes, are listed on the student's current transcript. If available, the current Fall semester classes and grades should be included. The Goldwater Foundation accepts both official and unofficial transcripts. An official transcript is one that is sent by a university directly to a CR who then uploads the transcript to the Goldwater nomination site. The Goldwater Foundation also accepts unofficial transcripts when certain conditions are met. On some campuses, a Goldwater CR can download a student's unofficial transcript directly. When this is the case, the Goldwater CR can download the student transcript and then upload the document to the Goldwater online site. On other campuses, only students can download their unofficial transcripts. In this case, the student can use this transcript if it is downloaded in the presence of the Goldwater campus representative. This transcript is then uploaded to the Goldwater nomination site by the CR. If a student cannot print an unofficial transcript in the presence of his/her CR (e.g., a student is studying abroad), the applicant will need to arrange to have an official transcript sent to the CR. **Again, be certain that all transcripts – official or unofficial – are accompanied by the key/guide that is provided by a university to enable a transcript to be interpreted correctly.** Students should talk with their Goldwater CRs to determine whether they will need to have "official" transcripts sent to the CR or can use "unofficial" transcripts. Have the discussion about transcripts early in the process to ensure that all transcripts one needs can be submitted before the nomination deadline. Students are responsible for getting all transcripts to their CRs in a timely fashion. Goldwater CRs are responsible for uploading transcripts to the Goldwater nomination site by the deadline.

6. A permanent resident of the U.S. must upload a copy of his/her Permanent Resident Card and a Letter of Intent to become a U.S. citizen to the online Goldwater nomination site.

Application Submission By The Campus Representative:

The names and the complete set of application materials for the students selected as an institution's Goldwater nominees must be uploaded to the Goldwater nomination site by the institution's Campus Representative on or before the application deadline, **the last Friday in January at 5:00 p.m. Central Time.**

STEP 1: Determine Students Suitability for a Goldwater Scholarship.

A student who is interested in being nominated for a Goldwater Scholarship is required to complete and submit a Student Profile and Pre-application, files that contain important background information on the student. When submitted by the student, the file is sent to the CR. The CR should carefully review this information in the Pre-application and Profile and make a decision as to whether or not the student would be an appropriate candidate for a Goldwater scholarship. Student notification should occur within about a week of when the student submits a Pre-application and Student Profile.

STEP 2: Monitor the Student's Application and Assist the Student with Identifying Appropriate References

Upon acceptance by the CR, the student is given access to the full application. CRs are able to monitor each student's progress as he/she works through the application (i.e., completes questions in the online questionnaire, uploads Research Essay, etc.)

Soon after acceptance of each student, CRs should begin a discussion with the student regarding potential references. This guidance is needed to ensure the student selects individuals who are appropriate letter writers for the Goldwater Scholarship. After this discussion, the student should meet with the identified individuals to determine whether or not they are willing to write letters for the student. The student should advise each individual who agrees to write a letter that he/she will be contacted by the Goldwater CR when the letter is needed.

STEP 3: Collect Student Transcripts

Transcripts from all colleges and universities a student has attended that are being used to compute the student's cumulative Grade Point Average (GPA) must be submitted as part of the application unless all the classes a student has taken at other institutions, along with the grades for those classes, are listed on the student's current transcript. If available, the current Fall semester classes and grades should be included.

The Goldwater Foundation accepts both "official" and, when certain conditions are met, "unofficial" transcripts.

Official Transcripts: Official transcripts are those sent "unopened" by the university directly to the CR. Once received, the CR should upload the transcripts to the Goldwater nomination web site (PDF format is preferred). Be certain to include the key/guide that universities provide to ensure the transcript is accurately interpreted. Do not forward transcripts to the foundation that are password protected! Save password protected transcripts as PDF files and then upload the PDF file.

Unofficial Transcripts: On some campuses, Goldwater Campus Representatives can download a student's unofficial transcript directly. If this is the case, CRs can then upload the document to the Goldwater online site. On other campuses, only students can download their unofficial transcripts. When this is the case, CRs can use this transcript if it is downloaded in the CR's presence.

The CR should then upload the transcript to the Goldwater nomination site. If a student cannot print an unofficial transcript in the CR's presence (e.g., a student who is studying abroad), then an official transcript should be used.

Please keep in mind that official and unofficial transcripts must be accompanied by the key/guide the university provides to interpret the transcript.

STEP 4: Complete the Institutional Nomination Form

This form must be completed and submitted to the Goldwater Foundation by the institution's Goldwater Campus Representative. In this document the Campus Representative must verify the nominee's eligibility and academic status, and formally transmit the nomination to the Goldwater Foundation. If this form is not submitted, the student's application will not be considered.

As part of the Institutional Nomination Form, the CR has the opportunity to submit a narrative statement that might, among other things, 1) describe the institution's Goldwater Scholar selection process, 2) provide a reason/explanation as to why the specific student was nominated, 3) explain why, despite an identifiable weakness, the student was nominated, 4) compare the student to other Goldwater Scholars the institution has nominated, and 5) address issues raised in the letters of recommendation. While the Foundation does not require a CR to complete this part of the nomination form, it is highly recommended that this section of the Institutional Nomination Form be completed.

STEP 5: Submit the Student's Nomination Before the Deadline

Completing the Institutional Nomination Form is NOT the final step in the nomination process. To nominate students, CRs must select **NOMINATED** from the status dropdown on their online Goldwater Dashboard. CRs may nominate up to 4 students.

All nominations must be submitted by the nomination deadline – the last Friday in January by 5:00 p.m. Central Time. Nomination packets that are late or that are missing supporting materials will not be reviewed.

Primary Field of Study	Sub-Fields of Study	
Chemistry	Chemistry 1 Chemical Catalysis Macromolecular, Supramolecular, and Nanochemistry Chemistry 3 Chemistry of Life Processes	Chemistry 2 Chemical Measurement and Imaging Chemical Structure, Dynamics, and Mechanism Chemical Theory, Models, and Computational Methods Environmental Chemical Systems Sustainable Chemistry Chemistry 4 Chemical Synthesis
Computer and Information Sciences & Engineering	Computer Science 1 Bioinformatics and other Informatics Data Mining and Information Retrieval Databases Graphics and Visualization Human-Computer Interaction Machine Learning Natural Language Processing Robotics and Computer Vision	Computer Science 2 Algorithms and Theoretical Foundations Communication and Information Theory Computational Science and Engineering Computer Architecture Computer Networks Computer Security and Privacy Computer Systems and Embedded Systems Formal Methods, Verification, and Programming Languages Software Engineering
Engineering	Aerospace and Other Engineering Fields Aeronautical and Aerospace Engineering Energy Engineering Nuclear Engineering Optical Engineering Systems Engineering Bioengineering Bioengineering Biomedical Engineering Biomedical Engineering Mechanical Engineering Mechanical Engineering	Chemical Engineering Chemical Engineering Polymer Engineering Civil & Environmental Engineering Civil Engineering Environmental Engineering Ocean Engineering Computer & Electrical Engineering Computer Engineering Electrical and Electronic Engineering Materials Engineering Industrial Engineering and Operations Research Materials Engineering
Geosciences	Geosciences 1 Aeronomy Atmospheric Chemistry Climate and Large-Scale Atmospheric Dynamics Magnetospheric Physics Paleoclimate Physical and Dynamic Meteorology Solar Physics Geosciences 3 Biogeochemistry Biological Oceanography Chemical Oceanography Marine Biology Marine Geology and Geophysics Physical Oceanography	Geosciences 2 Geobiology Geochemistry Geodynamics Geomorphology Geophysics Glaciology Hydrology Paleontology and Paleobiology Petrology Sedimentary Geology Tectonics

<p>Life Sciences</p>	<p>Biochemistry, Biophysics, and Structural Biology Biochemistry Biophysics Structural Biology</p> <p>Cell Biology Cell Biology</p> <p>Ecology Ecology Environmental Biology</p> <p>Evolutionary Biology and Systematics Biodiversity Evolutionary Biology Systematics</p>	<p>Genetics, Genomics, and Proteomics Bioinformatics and Computational Biology Genetics Genomics Proteomics</p> <p>Microbial Biology Microbial Biology</p> <p>Molecular and Systems Biology Molecular Biology Systems Biology</p> <p>Neurosciences Neurosciences</p> <p>Physiology, Organismal and Developmental Biology Developmental Biology Organismal Biology Physiology</p>
<p>Materials Research</p>	<p>Materials Research Biomaterials Ceramics Chemistry of materials Electronic materials Materials theory Metallic materials Photonic materials Physics of materials Polymers</p>	
<p>Mathematical Sciences</p>	<p>Mathematical Sciences 1 Algebra, Number Theory, and Combinatorics Analysis Geometric Analysis Logic or Foundations of Mathematics Probability Statistics Topology</p>	<p>Mathematical Sciences 2 Applied Mathematics Biostatistics Computational and Data-enabled Science Computational Mathematics Computational Statistics Mathematical Biology</p>
<p>Medicine</p>		<p>Medical Research</p>
<p>Physics and Astronomy</p>	<p>Physics 1 and Astronomy Astronomy and Astrophysics Atomic, Molecular, and Optical Physics Nuclear Plasma</p>	<p>Physics 2 Condensed Matter Physics Particle Physics Physics of Living Systems Solid State Theoretical Physics</p>
<p>Psychology</p>	<p>Psychology 1 Cognitive Psychology Cognitive Neuroscience Computational Psychology Psycholinguistics</p>	<p>Psychology 2 Developmental Experimental or Comparative Neuropsychology Perception and Psychophysics Physiological Quantitative</p>