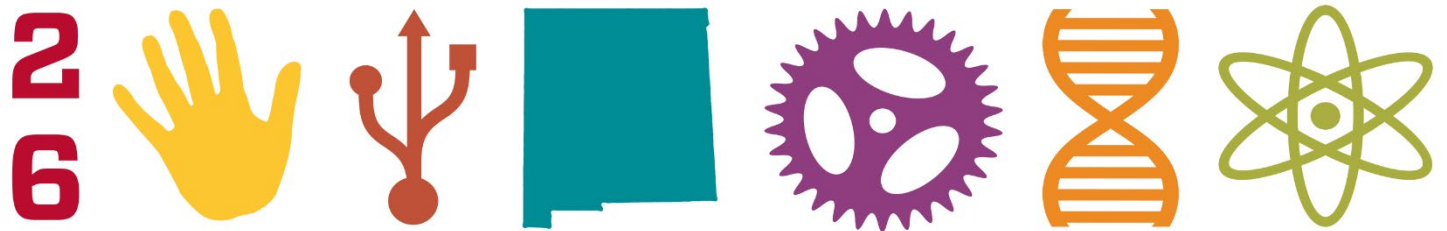


Booklet of Awards & Schedule of Events

2 Central New Mexico
0 STEM Research Challenge



March 18-22, 2026

2025-26 STEM-H Center & Central New Mexico STEM Research Challenge Sponsors/Donors

Thank you to the many donors and sponsors who not only make Research Challenge possible but also support the STEM-H Center and all of its endeavors year-round.

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UNM College of Pharmacy

UNM Combined BA/MD Degree Program

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(Individual cash & in-kind donations of \$2500+)

Patricia & Leonard Duda

Darwin Donors

(Individual cash & in-kind donations of \$1000-\$1499)

James Vigerust

Rob Arguelles

Carver Donors

(Individual cash & in-kind donations of \$500-\$999)

Catherine Turpin

Karen Kinsman & Holly Lowe

Ochoa Donors

(Individual cash & in-kind donations of \$100-\$249)

Selena Connealy

Emily Weigel

Randy Woodcock

The MANY judges who donate their time and expertise to interviewing students and evaluating projects.

The MANY other volunteers who do set-up, security, registration and countless other vital tasks. Research Challenge would not be possible without them!





HEALTH SCIENCES

OFFICE FOR DIVERSITY,
EQUITY & INCLUSION

STEM-H Center

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rclobby.unm.edu

SCHEDULE OF EVENTS

Visit the [RESEARCH CHALLENGE VIRTUAL LOBBY](#) for instant access to virtual Research Challenge events!

March 16 – 22 ~ Virtual Lobby Open~ visit at your convenience!

PROJECT SHOWCASE – browse all student research projects competing in Research Challenge

STEM HALL – visit profiles and interactive exhibits from our sponsors and community partners

SPEAKERS & PANELS – view engaging discussions with STEM professionals including:

- The 2026 featured STEM Panel is **a discussion with informal STEM educators**.

Monday, March 16

6:30 pm – 7:30 pm

Judging Workshop – Live on Zoom

Students, prepare for judging day with long-time Research Challenge Master Judge Chairs Len Duda and Robert Deblassie as they provide tips to prepare for judging interviews and answer your questions.

<https://tinyurl.com/47s84asa>

Wednesday, March 18

3:00 pm – 7:00 pm

Project Set Up – EXPO NM, Manuel Lujan Building

ALL student exhibitors must register and set up their project displays during this time. **Doors will close promptly at 7:00 pm!**

Community Partner Showcase will also take place during set up. We are excited to host fun and informational booths from local STEM partners! **Students, complete a Community Partners Passport by visiting booths. Turn in completed passport before you leave and be entered into a raffle for prizes!**

Thursday, March 19

- 9:45 am – 12:00 pm **Junior Division Category Judge Interviews** – *Manuel Lujan Bldg, Hall A*
STUDENTS AND JUDGES ONLY ON EXHIBIT FLOOR! Doors open at 9:30am. **9:45 is the required start time for ALL students.**
- 12:00 pm – 1:15 pm **Lunch Break** —NOT PROVIDED—Food vendors will be available.
EXHIBIT HALL CLEARED OF ALL STUDENTS.
- 1:30 pm – 3:15 pm **Junior Division Special Award & Grand Award Interviews**
– *Manuel Lujan Bldg, Hall A*
STUDENTS AND JUDGES ONLY ON THE EXHIBIT FLOOR!
Exhibitors must take project board and all other materials with them when they leave at the end of the day!
-

Friday, March 20

- 9:30 am – 12:00 pm **Hands on activities with Air Force Research Labs and ¡Explora!**
(for participating 4th & 5th grade students) – *Manuel Lujan Bldg, Hall A*
- 9:45 am – 12:00 pm **Senior Division Category Judge Interviews** – *Manuel Lujan Bldg, Hall B*
STUDENTS AND JUDGES ONLY ON EXHIBIT FLOOR! Doors open at 9:30am. **9:45 is the required start time for ALL HS students.**
- 12:00 pm – 1:15 pm **Lunch Break** —NOT PROVIDED— Food vendors will be available.
EXHIBIT HALL CLEARED OF ALL STUDENTS.
- 1:30 pm – 3:15 pm **Elementary Division Judging Interviews** – *Manuel Lujan Bldg, Hall B*
STUDENTS AND JUDGES ONLY ON THE EXHIBIT FLOOR!
Note: elementary students will be interviewed by both category and special award judges during this time.
- 1:30 pm – 3:15 pm **Senior Division Special Award & Grand Award Interviews**
– *Manuel Lujan Bldg, Hall B*
STUDENTS AND JUDGES ONLY ON THE EXHIBIT FLOOR!
Exhibitors must take project board and all other materials with them when they leave at the end of the day!
-

Sunday, March 22

- 4:30 pm **Award Winners Reception** – *UNM Student Union Building*
For award winners and guests only. Light refreshments and “selfie station”
- 5:15 pm **Grand Awards Ceremony** – *UNM Student Union Building*
Awards Ceremony is by invite only. Student winners, parents/guardians and teachers will be notified on Saturday if they have won an award and are invited to attend the ceremony.
-

Note: Senior Division ~ high school; Junior Division ~ middle school; Elementary Division ~ 4th & 5th Grade

2026 GRAND AWARDS CEREMONY

Central New Mexico STEM Research Challenge

Sunday, March 22



Keynote Speaker

Deleso A. Alford, J.D., LL.M. is the University of New Mexico (UNM) OfDEI Humanity Matters Visiting Professor. She is no stranger to UNM, first serving as the UNM Health Sciences Center, Office for DEI Inaugural Diversity Visiting Scholar in 2012, then returned in 2018, and in 2019 as UNM HSC's Distinguished Diversity Scholar Luncheon speaker and again in May 2024. Her current visiting professorship is led by the HSC Office for DEI leadership and is an innovative collaborative effort with several contributing funding partners including the Health Sciences Library and Informatics Center, UNM Hospital, and the Office for Community Health, along with in-kind contributions from the Office for Continuous Professional Learning. Her academic department is Family & Community Medicine, and she is also an Affiliated Faculty member at UNM School of Law. Since her visitorship which began in February 2025, the integration of Professor Alford's interdisciplinary and interprofessional scholarship has fostered meaningful connections and augmented impactful programming with, and our UNM faculty, staff, learners, graduates, trainees, community members, and leaders.

Professor Alford is notably referred to as the "Architect of the theory of unjust enrichment, as applied to the immortal cell line of Mrs. Henrietta Lacks." Her work bridges law, healthcare, and ethics using what she calls "HER stories"—the unique and particularized lived inhumane experiences of marginalized women intersecting with healthcare and research. Professor Alford's national reputation as a speaker and scholar with outstanding contributions to the legal field has been memorialized as an inductee into Southern University Law Center's 2025 Hall of Fame, where she holds the distinguished rank of Rachel Emanuel Endowed Professor. Her seminal law review article authored in 2012 entitled, *HeLa Cells and Unjust Enrichment in the Human Body*, serves as the catalyst and theory of the case for the historical lawsuits filed on behalf of the Estate of Henrietta Lacks, after over seventy years fighting for justice. Professor Alford's book proposal entitled, *Mrs. Henrietta Lacks, HeLa Cells and Unjust Enrichment: Humanity Matters* was recently accepted by Carolina Academic Press.

The Association of American Law Schools (AALS) selected Professor Alford as the 2025 recipient of the Impact Legacy Award for her scholarship and legal advocacy in the historic Henrietta Lacks' cases amongst other contributions. She is the prestigious 2024 National Newspaper Publishers Association (NNPA) awardee for the National Leadership Award for Education held during the Congressional Black Caucus Foundation's Annual Legislative Conference.

Recently, on behalf of the UNMH Patient Family Advisory Committee (PFAC), Professor Alford received an iCare Award for exemplifying UNMH excellence during her presentation aimed at engaging patient family advisors to share their lived experience as it relates to Humanity Matters. Her scholarship has moved from classrooms to courtroom, benefiting legal, healthcare professions and society. Professor Alford earned a Bachelor of Science, magna cum laude at Southern Univ. A&M College, a Juris Doctorate at Southern University Law Center, and a Master of Laws at Georgetown University Law Center. Her interest in bioethics led to her earning a Certification in Clinical Bioethics from the Medical College of Wisconsin.

Deleso Alford, J.D., LL.M.



Byron Morton



Master of Ceremonies

Emmy Award-Winning and Certified Broadcast Meteorologist Byron Morton has been forecasting New Mexico weather for more than two decades. His fascination with weather began while growing up in Tornado Alley. And...he did chase tornadoes while interning in Oklahoma City.

Byron graduated with a Bachelor of Science degree from the College of Geosciences at the University of Oklahoma in 1996 (Boomer, Sooner!)

Byron holds seals of approval for television from both the American Meteorological Society and the National Weather Association. He also served on boards for both organizations. Byron is also very active within his parent company, Hearst Television (HTV) – acting as a co-chair for HTVPride (An LGBTQ+ employee resource group) and he is involved in the HTV mentor program.

When he's not keeping an eye on the sky, Byron loves the outdoors, hitting the gym, is an avid foodie and enjoys traveling. Catch Byron at 11 am and 4 pm weekdays on KOAT 7!

Regional Research Challenge ~ Top-of-Category Awards

Un-sponsored category awards are sponsored by operational funds donated by various companies.

The following prizes are awarded in each of the competition categories:

- First Place:** \$100, gold medallion and certificate
- Second Place:** \$75, silver medallion and certificate
- Third Place:** \$50, bronze medallion and certificate
- Honorable Mention:** Medallion and certificate

2026 Categories

- Elementary Chemistry
- Elementary Engineering & Energy
- Elementary Life & Environmental Sciences
- Elementary Physical Science
- Junior Animal Science
- Junior Behavioral & Social Sciences
- Junior Chemistry
- Junior Computer Science
- Junior Earth & Environmental Sciences
- Junior Energy & Transportation
- Junior Engineering
- Junior Medicine & Health
- Junior Microbiology
- Junior Physics & Astronomy
- Senior Behavioral & Social Sciences
- Senior Biochemistry
- Senior Chemistry
- Senior Computer & Mathematical Sciences
- Senior Earth & Environmental Sciences
- Senior Energy & Transportation
- Senior Engineering
- Senior Materials Science
- Senior Medicine & Health Sciences
- Senior Microbiology
- Senior Physics & Astronomy
- Senior Plant Science
- Senior Robotics & Intelligent Machines

Sponsor

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- Albuquerque Journal
- Sandia National Laboratories
- Intel Corporation
- UNM School of Engineering
- UNM School of Medicine/Health Sciences Center
- The Boeing Company
- Albuquerque Journal
- Sandia National Laboratories
- Intel Corporation
- UNM School of Engineering
- UNM School of Medicine/Health Sciences Center
- The Boeing Company

Regional Research Challenge ~ Top Junior Division Winner Award

Recognition of the top Junior Division exhibitors.

- | | | | | |
|------------------------|---------------------------|---------------------------|----------------------------|---------------------------|
| Junior Division | Physical Sciences: | First Place: \$250 | Second Place: \$200 | Third Place: \$150 |
| | Life Sciences: | First Place: \$250 | Second Place: \$200 | Third Place: \$150 |

Thermo Fisher Scientific Junior Innovators Challenge

Awarded to the 1st and 2nd place winners of **EACH** category in the Junior Division

- | | |
|------------------------|--|
| Junior Division | First & Second Place: Certificate and an invitation to submit project to national competition |
|------------------------|--|

Regional Representatives to the International Science and Engineering Fair (ISEF)

Top projects will be named ISEF Finalists and compete at ISEF in May, 2026

- | | |
|------------------------|---|
| Senior Division | Excellence Award: Expense paid trip to Phoenix, AZ to compete in ISEF
<i>(awarded to top placing individual or team projects; up to four projects will advance)</i> |
| Junior Division | Excellence Award: Expense paid trip to Phoenix, AZ to attend ISEF as a student observer
<i>(awarded to the top placing 8th grade student)</i> |

ISEF Finalist Awards sponsored by Nusenda Credit Union

Awarded to each regional ISEF qualifier and observer *(funds will be split evenly among team members for any team projects that qualify).*

- Excellence Award:** \$250

A²CE Award for Innovativeness

For excellent projects in any category that display innovativeness and/or a novel or creative approach to answering scientific questions.

Elementary Division **First Place:** \$50

Junior Division **First Place:** \$50

Senior Division **First Place:** \$50

AIC General Contractors Award for Best Sports Related Project

For an excellent project related to sports.

Any Division **First Place (x2):** \$250

Albert M. Kudo Memorial Award

For an excellent project in any category in memory of Dr. Albert M. Kudo.

Junior or Senior Division **First Place:** \$100

Albuquerque Area Extension Master Gardeners

For excellent projects related to plants

Junior Division **First Place:** \$100 **Second Place:** \$75 **Third Place:** \$25

Senior Division **First Place:** \$100 **Second Place:** \$75 **Third Place:** \$50

Albuquerque Astronomical Society Award

For the best Astronomy related projects. Winners invited to exhibit projects at Astronomy Day. Prizes include 1-year membership in the Albuquerque Astronomical Society.

Junior Division **First Place:** \$250 **Second Place:** \$175 **Third Place:** \$100

Senior Division **First Place:** \$250 **Second Place:** \$175 **Third Place:** \$100

Albuquerque Rocket Society Award in Memory of Jerry Cross

For excellent projects related to rocketry or the field of aeronautics.

Junior or Senior Division **First Place:** \$100

American Association of University Women Young Scientist Award

For excellent projects by female exhibitors in the categories of Physics, Computer Science, or Engineering.

Elementary Division **First Place (x4):** \$25

Junior Division **First Place (x6):** \$30

American Chemical Society Awards, Central New Mexico Section

For the projects that best demonstrate a thorough and logical approach to the investigation and observation of a chemical phenomena or property using the principles of the scientific method.

Junior Division **First Place:** \$200

Senior Division **First Place:** \$200

Junior or Senior Division **First Place:** \$200

American Institute of Aeronautics and Astronautics Award

For projects relating to the fields of Aeronautics and Astronautics.

Junior Division **First Place (x2):** \$125 & certificate. Membership in AIAA

Senior Division **First Place (x2):** \$125 & certificate. Membership in AIAA

American Psychological Association Award

For an exhibit recognizing outstanding research in psychology in the category of behavioral and social sciences.

Junior or Senior Division **First Place:** Certificate & 1 year student membership in APA

Association for Women Geoscientists Award

For a female student whose project best exemplifies high standards of innovativeness and scientific excellence in the geosciences.

Junior or Senior Division **First Place:** Certificate & honorary membership in AWG

Association of Old Crows Award

For a project in the Elementary Division related to electromagnetic spectrometry or information operations.

Elementary Division **First Place:** \$100 **Second Place:** \$50

Austin Hudson LaPore Biochemistry Award

For projects that demonstrate research excellence in biochemistry, pharmaceutical sciences, or related field.

Senior Division **First Place (x2):** \$100

Bohannon Huston Award

For outstanding Engineering projects.

Any Division **First Place (x2):** \$250

Chalmers Ford Award

For an excellent project related to the automotive industry.

Elementary Division **First Place:** \$150

Junior or Senior Division **First Place:** \$150

Citadel Securities Innovation Prize

For an outstanding project that displays innovation and expert data analysis to address and solve real-world problems.

Junior Division **First Place:** \$100

Senior Division **First Place:** \$100

Climate Change Award

Presented to the project that demonstrates the greatest insight into climate change using the scientific method.

Elementary Division **First Place:** \$75

Junior Division **First Place:** \$75

Senior Division **First Place:** \$75

Diane Vigerust Memorial Award

For a project by or benefiting a student with special needs.

Any Division **First Place:** \$100 **Second Place:** \$50

DoD STEM Leadership Prize

For a student who demonstrates excellence in STEM knowledge, technical and problem solving skills, communication skills, creative thinking and determination to overcome challenges throughout the research project.

Junior Division **First Place:** \$100

Don't Stop Now Award

For projects in any category that show enthusiasm and promise for continued learning.

Junior or Senior Division **First Place (x6):** \$50

Dr. Donald Partridge Memorial Neuroscience Award

For the projects which best demonstrate and test principles of neural science. Human or animal studies are eligible. Students should demonstrate a knowledge about the brain systems studied in their research projects.

Junior Division **First Place:** \$100 **Second Place:** \$50

Senior Division **First Place:** \$100 **Second Place:** \$50

Dr. John K. Prentice "Coolness" Award

For especially novel and ingenious projects in any category in memory of Dr. John K. Prentice.

Junior Division **First Place (x2):** \$100

Senior Division **First Place (x2):** \$100

Enchanted Lens Camera Club Award

For projects which either advance the state of the art of film/digital photography, or use photography as a key diagnostic in an engineering and/or science project.

Junior Division **First Place:** \$75

Senior Division **First Place:** \$75

Engineering Excellence – New Mexico Engineering Foundation

For excellence in Engineering and/or applied topic or research in Engineering, Physics, Astronomy, Computer Science or Energy & Transportation.

Senior Division **First Place(x2):** \$200

ENLACE Statewide Collaborative Excellence Award

For excellent projects in any category.

Elementary Division **First Place (x4):** \$25 UNM Bookstore Gift Card

Junior Division **First Place (x4):** \$25 UNM Bookstore Gift Card

Senior Division **First Place (x4):** \$25 UNM Bookstore Gift Card

Explora Science Center and Children's Museum Award

For excellent projects in Chemistry, Environmental Science, Math, Microbiology or Physics.

Junior Division **First Place (x10):** \$50 plus an invitation to exhibit project virtually at Explora.

Groundwater Partners Award

For an outstanding project that demonstrates innovation in promoting sustainability in environmental and geosciences.

Elementary Division **First Place:** \$100

Junior Division **First Place:** \$100

Senior Division **First Place:** \$100

International Test & Evaluation Association Awards, Roadrunner Chapter

For the best application of test and evaluation techniques in an experiment.

Junior Division	First Place: \$100	Second Place: \$50	Third Place: \$25
Senior Division	First Place: \$250	Second Place: \$100	Third Place: \$50

Jim Adams Memorial Award

For an excellent project by a student faced with physical or mental challenges.

Junior or Senior Division	First Place: \$100
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Kate Barone Dimock Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division	First Place: \$200
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Lemelson Early Inventor Prize

For an excellent invention project which demonstrates problem-solving, empathy, and entrepreneurial and environmental-friendly thinking.

Junior Division	First Place: \$100 & certificate
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Louis & Stacy Abruzzo Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division	First Place (x2): \$250
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Mauro4micro Teacher Awards

For creative and insightful science teachers in memory of Dr. Mauro Martignoni.

Any Division	Teacher Award (x4): \$250
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Maxine Grossman Award

For an excellent project in the category of Plant Science.

Junior or Senior Division	First Place: \$100
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Nancy Schmierbach Award

For an excellent project from a Valencia County student related to real estate, including architecture, civil engineering or environmental issues.

Any Division	First Place (x2): \$250
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NASA Earth System Science Award

For the project that best demonstrates insight into Earth's interconnected systems. The project should incorporate studies of the different components of Earth systems, their interactions and their evolution over time.

Junior or Senior Division	First Place: Certificate & invitation to a webinar with a NASA scientist
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National Oceanic and Atmospheric Administration Award

For the project whose research emphasizes NOAA's mission to understand and predict changes in Earth's environment and conserve and manage coastal and marine resources.

Junior or Senior Division	First Place: Certificate
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New Mexico Trout Award

For a project that supports the goals of New Mexico Trout: the study, conservation and restoration of riparian habitats.

Junior Division	First Place: \$100 and membership	Teacher Award: \$100
Senior Division	First Place: \$100 and membership	Teacher Award: \$100

Pavilion Construction Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division	First Place (x4): \$250
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Pérez López Excel NM Award

For a project in Computer or Mathematical Sciences that demonstrates hard work and dedication, a strong understanding of the methods used in the project design, creativity in overcoming challenges encountered during the course of the research and a genuine joy and enthusiasm for learning.

Junior Division	First Place: \$100
Senior Division	First Place: \$250

Pérez López Salud NM Award

For a project in Behavioral/Social Sciences that demonstrates excellence in journaling through dedicated documentation throughout the course of the project, critical and creative thinking and the growth of a young researcher as observed through their curiosity and reflection. Special consideration is given to students who examine how social determinants of health shape health outcomes with an understanding that an important goal of research is to serve humanity and advance equity, compassion and meaningful change.

Junior Division	First Place: \$100
Senior Division	First Place: \$250

Public Service Company of New Mexico (PNM) Awards

For an excellent project related to utility efficiency, energy or engineering.

TBD

Regeneron Biomedical Science Award

Awarded to an exceptional student scientist who not only demonstrates an impressive command of biomedical science and research but also embodies Regeneron's core values and behaviors, known as The Regeneron Way.

Senior Division **First Place:** \$375

Regional Research Challenge Ingenious Research Award

For a project involving the testing and/or use of common materials.

Junior Division **First Place:** \$100

Regional Research Challenge Junior Encouragement Awards

Sponsored by the Foreman Family. For outstanding middle school projects in **EACH** category.

Junior Division **First Place:** \$35 **Second Place:** \$30 **Third Place:** \$25
Teacher Award: \$25 to teacher of first place winners

Regional Research Challenge Scholarships to UNM

Senior Division **First Place:** A minimum \$750 UNM scholarships to all 12th grade participants who enroll at UNM in the Fall of 2026 (one-time award for Fall 2026)

Retired Director Karen Kinsman "If I Can See It, I Can Be It" Award

For excellent projects in any category where the student exhibitor demonstrates an understanding of the research process, ability to communicate effectively and enthusiasm about their work

Elementary Division **First Place:** \$50
Junior Division **First Place:** \$100
Senior Division **First Place:** \$100

Richard Bild Memorial Research Challenge Award

For a student or team whose project demonstrates excellence in interdisciplinary research and who demonstrates an ongoing passion for STEM with excellent problem-solving, communication, and leadership skills.

Elementary Division **First Place(x2):** \$25 **HM:** Certificate
Junior Division **First Place(x2):** \$100 **HM:** Certificate
Senior Division **First Place(x2):** \$200 **HM:** Certificate

Ricoh Regional Sustainable Development Award

For a project whose principles and technical innovations offer the greatest potential for increasing our ability to grow environmentally friendly and socially responsible businesses.

Junior or Senior Division **First Place:** Certificate

Sandia Peak Tram Company Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division **First Place (x2):** \$250

Shirley Anderson Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division **First Place:** \$200

Society for In Vitro Biology Award

For the most outstanding 11th grade students exhibiting in the areas of plant or animal in vitro biology or tissue culture.

Senior Division **First Place:** Certificate and membership in SIVB

Society of Women Engineers Award, Central New Mexico Section

For an exhibit in Engineering, Physics & Astronomy, Computer Science, Environmental Management or Energy & Transportation.

Junior Division **First Place (x2):** \$100

Springer5 Investments Award

For an excellent project from a Rio Rancho student related to real estate, including architecture, civil engineering or environmental issues.

Any Division **First Place:** \$300

Springhill Suites by Marriott at the Journal Center Award

For an excellent project related to real estate, including architecture, civil engineering or environmental issues.

Any Division **First Place (x4):** \$250

United States Air Force Awards

For projects in Engineering, Space Sciences, Mathematics, Computers or Environmental Sciences or for projects that offer Air Force applicability.

Junior or Senior Division **First Place (x4):** Certificate & Tangible Award

United States Metric Association Award

For a project that involves a significant amount of quantitative measurement and which best uses the SI Metric System.

Junior or Senior Division **First Place:** Certificate & 1 year of membership in USMA

United States Navy and Marine Corps Awards

Naval Science Awards for excellent individual projects in science and engineering.

Junior Division **First Place (x3):** Certificate of achievement and \$25

Senior Division **First Place (x3):** Certificate of achievement and \$50

University of New Mexico College of Pharmacy Awards

For a project related to the Pharmaceutical Sciences which best demonstrates an innovative problem, the scientific approach to the problem, the methodology for solving the problem, and the scientific interpretation of the results.

Elementary Division **First Place:** \$100

Senior Division **First Place:** \$200 **Teacher Award:** \$200

University of New Mexico Health Sciences Center Awards

For excellent projects in each of the categories of Biochemistry, Medicine & Health and Microbiology.

Junior Division **First Place:** \$150 **Second Place:** \$100 **Third Place:** \$50

Senior Division **First Place:** \$150 **Second Place:** \$100 **Third Place:** \$50

UNM BioTime Awards

For outstanding projects focused on Earth-life interactions, especially ranging across time and/or geographic gradients.

Junior Division **First Place:** \$300 & a fossil fish

Second Place: \$150 & a fossil fish

Third Place: \$100 & a fossil fish

Water Environment Federation - Stockholm Junior Water Prize

For an outstanding project related to water quality, water resource management, water protection, water treatment.

Senior Division **First Place (x2):** Certificate and possible advancement to State Stockholm competition.

Yale Science and Engineering Association, Inc. Award

For an outstanding 11th grade student exhibiting in the area of Computer Science, Engineering, Physics or Chemistry.

Senior Division **First Place:** Certificate

Congratulations to all the student participants and winners!



27 Co Cobalt 58.933	7 N Nitrogen 14.007	31 G (a) Gallium 69.732	88 Ra Radium 226.025	22 T (i) Titanium 47.88	16 S Sulfur 32.066
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Dear Research Challenge Participants,

As President of The University of New Mexico, it is my sincere pleasure to welcome you to UNM for the 66th Annual Central New Mexico STEM Research Challenge. We are delighted to have you here, and Lobos everywhere congratulate you for all you've accomplished.

The University of New Mexico is New Mexico's premier Research 1 university, which means innovation and creativity infuses everything we do, from architecture to zoology. Our diverse research and creative works enable student success, engage our local and global communities, and help innovation thrive. It's all part of our mission as New Mexico's flagship university to meet the challenges and opportunities facing humanity head on. We do so proudly, as we contribute to the advancement of New Mexico.

That's why you're here today, and it is our privilege to be your host. We are proud to encourage each of you, the next generation of STEM professionals, to innovate and develop revolutionary ideas that will serve our state, our nation, and our planet. This long-running competition, which can trace its origins back to 1960, is a big step in preparing you for your future career in STEM, whether it's in academics, at one of our government facilities or national laboratories, in a tech startup, or maybe even in something that we haven't dreamed of yet—but that *you* might.

Many former participants of this competition have gone on to win international prizes and major recognition. Some have invented something new; others have gone on to teach in universities or run research laboratories. New Mexico is home to innumerable amazing scientists and engineers who bring their expertise and energy to every corner of the Land of Enchantment.

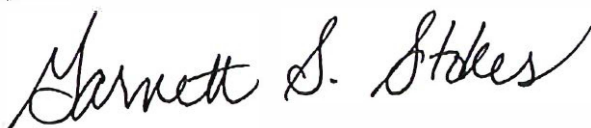
As we continue to advance into a rapidly growing digital age, I am confident New Mexicans will be enthusiastically leading the charge into the future, developing strategies to fight disease, explore the deepest parts of our universe, and learn to develop smarter and responsible uses for artificial intelligence. I hope you will never stop inventing, never stop innovating, and never stop asking questions. Your curiosity is the key to finding innovative solutions to the challenges we face here in New Mexico and around the world.

I'm excited to learn more about all you've accomplished, and I hope you'll consider bringing your own imagination and innovation to The University of New Mexico. Whatever your future holds, I wish you the best and the utmost of success.

I know how much work it took to get here, and the Lobos are proud of every one of you. We also know that you still have plenty of work ahead this weekend, so we'll let you get to work!

Have a great competition and thank you again for joining us here at The University of New Mexico.

Regards,



Garnett S. Stokes
President



March 22, 2026

Dear Research Challenge Participants,

I want to personally congratulate you on participating in the 66th Annual Central NM STEM Research Challenge. Your commitment to inquiry and discovery reflects the qualities that will shape the future of New Mexico.

Research is not easy. It involves unexpected results and setbacks, and you must be willing to keep asking questions even when the answers are difficult to find. The critical thinking, communication, and evidence-based reasoning skills you are developing now are the same skills we rely on every day in medicine, science, and public service.

At The University of New Mexico Health Sciences Center, we are working to train the next generation of health professionals and scientists who will serve communities across our state. Many of the challenges we face will be solved by people who once stood where you are now.

Whether you pursue a career in health care, engineering, public health, or another STEM field, I hope you continue to stay curious. New Mexico needs thoughtful, prepared leaders who are willing to do hard work in service of others.

I am proud of the effort you have shown and look forward to seeing where your paths lead.

Sincerely,

A handwritten signature in blue ink, appearing to read 'Michael Richards'.

Michael Richards, MD, MPA
Executive Vice President for Health Sciences Center
CEO for University of New Mexico Health System



March 22, 2026

Dear Research Challenge Participants,

Congratulations on your remarkable achievement in participating in the 2026 Central NM STEM Research Challenge! This milestone is not just a testament to your hard work and perseverance, but it also lays a strong foundation for your future academic and professional endeavors. Embrace this experience as a steppingstone, as the dedication and creativity you have demonstrated will undoubtedly propel you toward greater successes. Thank you for taking on this challenge and know that I am truly impressed with your drive, creativity, and innovative spirit.

As a scientist and researcher, I know that completing a research or engineering project during the best of times is difficult and can present many obstacles that must be overcome. I applaud your interest in discovery and encourage the curiosity you possess to explore new territory and tackle new challenges. Our state is home to world-class scientists and engineers, many of whom started out just like you in local and regional competitions. I believe many of you will ultimately join their ranks and contribute to the advancement of the digital age, produce solutions to global climate change, develop innovative treatments for a range of health issues, and create new products that improve our daily lives. As vice president for research at The University of New Mexico, I also encourage you to explore the many quality programs in science and engineering that UNM has to offer.

It's imperative we acknowledge that the success of this event is a testament to the incredible teamwork that underpins every student's research journey. We thrive when parents, teachers, mentors, friends, volunteers, and sponsors unite their efforts. This collective spirit not only fuels creativity and innovation but also reinforces the idea that together, we can tackle even the most daunting challenges the world throws our way. So, let's celebrate this collaboration of enthusiasm and support – because when we join forces, the possibilities are truly limitless!

I hope you take a moment to genuinely enjoy every aspect of this unique event, while continuing to ask questions of yourself and the other participants to truly understand more about our amazing world and what we are capable of achieving. I look forward to learning more about your successes in the years to come.

Best of luck in the 2026 Central NM STEM Research Challenge!

Sincerely,



Ellen R. Fisher, Ph.D.
UNM Vice President for Research
Professor of Chemistry





Dear Central NM STEM Research Challenge Participants,

Congratulations on participating in the 66th Annual Central NM STEM Research Challenge, and thank you for bringing your talent, curiosity, and dedication to this year's competition.

For nearly 66 years, this event has celebrated the creativity and determination of students across Central New Mexico. By choosing to ask meaningful questions, design thoughtful investigations, and share your discoveries, you have demonstrated not only academic excellence, but courage—the courage to explore the unknown and present your ideas to others.

Research is more than a project—it is an act of hope. It reflects your belief that through knowledge, innovation, and collaboration, we can better understand our world and improve it. Whether your work explored health, engineering, environmental science, technology, or mathematics, your efforts contribute to a stronger and brighter future for our communities.

As Vice President and Executive Diversity, Equity, and Inclusion Officer at the University of New Mexico Health Sciences Center, I see every day how vital it is to cultivate talent right here at home. New Mexico's future depends on leaders like you—leaders who are willing to think critically, collaborate across differences, and use knowledge in service of community. The curiosity you nurture today can become tomorrow's breakthrough in cancer research, climate resilience, public health, space exploration, or equitable access to care.

Please continue asking questions. Continue seeking mentors. Continue believing that your voice and your ideas matter—because they truly do.

I join your families, educators, mentors, and supporters in celebrating your achievements. We are proud of you, grateful for your participation in this year's Challenge, and excited to see the impact you will make in the years ahead.

With warm congratulations,

A handwritten signature in blue ink, appearing to read "Valerie Hernandez".

Vice President and Diversity, Equity & Inclusion Executive Officer
HSC Endowed Professorship for Equity in Health
Professor of Family & Community Medicine
Executive Director, UNM SOM Combined BA/MD Degree Program
PI, New Mexico Workforce Diversity Center of Excellence





Projects and virtual materials (abstract, virtual display board) can be viewed in the online [Project Showcase](#). Click on link or scan QR code and then enter **KEY: CNMSRC2026**



Elementary Chemistry

- ECHEM-1 **Karam Mansour** *Foil Fables: Is Alzheimer's on the Menu?*
- ECHEM-2 **Nicole Gonzalez & Taya Nance** *How to Grow Crystals*
- ECHEM-3 **Sophia Lucero** *Dog Treats*
- ECHEM-4 **Asher Storms** *What's the Matter?*
- ECHEM-5 **Avianna Lopez** *Nobody Wants Melted Ice Cream*
- ECHEM-6 **Hind Awawdeh** *Toothpaste Test*
- ECHEM-7 **Wyatt Kersting** *Flower Color Change*
- ECHEM-8 **Raylynn Norris & Jaycee Shiver** *Egg Toothpaste*
- ECHEM-9 **Eshika Amol** *Candy Chromatography*
- ECHEM-10 **Dixie McDonough & Reagan Smith** *What Is Elephant Toothpaste?*
- ECHEM-11 **Charlotte Thoren** *Tooth Decay With Eggs*
- ECHEM-12 **Braydon Winters** *Growing Crystals in Different Temperatures*
- ECHEM-13 **Lilyana Adams** *The Chemical Reaction of Elephant Toothpaste*
- ECHEM-14 **Jaxton Mayberry** *"Ice"mosis*
- ECHEM-15 **Sadra Ghasempour** *Baking Powder vs Baking Soda: Which Makes Pancakes Fluffier?*

Elementary Engineering & Energy

- EENG-16 **Ameera Jamaledin** *Potato Power*
- EENG-17 **Kenny McFarlane, Anthony Navarro & Lincoln Snyder** *CubeSat*
- EENG-18 **Orhan Yanar** *Built Forever*
- EENG-19 **Madison Ortiz** *Biodegradable Plastic Bags*
- EENG-20 **Estes Gaasedelen** *Training AI to Recognize Emotions*
- EENG-21 **Cody Bowdoin** *How Do Pistons Work?*

EENG-22 **Oliver Hopkins & Abigail Montoya** *Air Powered Cars*

EENG-23 **Houston Chavez, Jahnaiyah Graham & Lyric Stitt** *What Is the Best Bowl for Ramen?*

EENG-24 **Dexter Baguski & Cruz Benally** *The Butlerbot 1000*

EENG-25 **Forest Brister & Bryce Encinias** *Fruits vs Vegetables*

EENG-26 **Marc Crozier-Molina** *How Does Different Insulation Affect the Heat in a Chicken Coup?*

Elementary Life & Environmental Sciences

ELIFE-27 **Eliott Harding** *Sea Water Should be Used for Firefighting*

ELIFE-28 **Brantley Maestas** *Do "Energy Drinks" Actually Raise Your Blood Pressure?*

ELIFE-29 **Sanvi Lathish** *How Do Different Biodegradable Materials Affect Soil Health?*

ELIFE-30 **Kayla Torres** *Blooming Flowers*

ELIFE-31 **Allison Cain** *Pollution vs Plants: Who Will Win?*

ELIFE-32 **Emma Garcia** *Can Other Fluids Help Plants Grow?*

ELIFE-33 **Sofia Anchondo, Emma Leinen & Isabella Valencia** *Which Warm Up Makes You More Flexible?*

ELIFE-34 **Sarah El-Emawy** *Worms at Work*

ELIFE-35 **Braiden Alestra** *Leaf Color Extraction*

ELIFE-36 **Kamila Hernandez & Elizabeth Rain Lobos** *Liquid Test*

ELIFE-37 **Patrick Archibeque** *The Great Lima Bean Grow-off!*

ELIFE-38 **Elora Delaney, Olivia McConnell & Amelia Schnepfle** *Mystery Jello*

ELIFE-39 **Maggie Meyerson** *Hydroponics Part 2: Growing With Different Light Sources*

Elementary Physical Sciences

EPHYS-40 **Abigail Hulskamp** *Mass Is the Key to Inertia*

EPHYS-41 **Aadav Shah** *Pendulum Power*

EPHYS-42 **Shaun Dev Zachary Bhattra** *Measuring Light Speed Using a Laser Through a Gelatin*

EPHYS-43 **Eshana Paruchuri** *Invisible Pollution, Magnetic Solution*

EPHYS-44 **Sloan Gonzales** *Which String Carries Sound Best?*

EPHYS-45 **Cody Cashman & Ethan Dickerson** *Golf Ball of Doom*

EPHYS-46 **Andreas Gallis** *Ranking the Vitamin C Content in Fruits and Evaluating and Its Oxidative Stability*

EPHYS-47 **Niko Barela, Lucas Sipes & Preston Vogt** *Flying Lightning*

EPHYS-48 **Jayla Kirlin, Kayleigh Lallement & Morgan Waugh** *Go With the Flow*

EPHYS-49 **Annika Mitchell** *Turning the Tables on Wobbly Tables*

EPHYS-50 **Azra Begit** *Reducing Drag: A Comparative Study of Airfoils With and Without Winglets*

EPHYS-51 **Mohammed Awawda** *Electrolyte Energy*

EPHYS-52 **Killian Thomas** *Burn, Baby, Burn*

EPHYS-53 **Margaret Eichenfield** *Understanding Pendulums*

Junior Behavioral & Social Sciences

JBEH-101 **Aya Abdullah** *Walk the Talk*

JBEH-102 **Haley Vincent** *Sunlight to Orange Glow: How Lighting Influences Human Abilities*

JBEH-103 **Max Berger & Balraj Sandhu** *Music and Cognitive Performance: Effects on Memory Recall*

JBEH-104 **Anna Cota** *Ready. Set. React*

JBEH-105 **Mira Nakip** *How Middle Schoolers Learn Best*

JBEH-106 **Eli Angelo Sepulveda** *GAME ON!*

JBEH-107 **Kenzie Otero** *Blind Tasting*

JBEH-108 **Rustin Morgan** *Fear*

JBEH-109 **John Wayne Tapia** *Reaction Time*

Junior Chemistry

JCHEM-201 **Jordan Krein** *Can Mud Power an LED? Exploring the Feasibility of Earth Batteries*

JCHEM-202 **Alharith Mansour** *Dissolution Showdown: Brands vs Generics in the Stomach Acid Challenge*

JCHEM-203 **Ghalia Mansour** *Colorful Chemistry: The Hidden Impact of Food Dyes on Acidity and Health*

JCHEM-204 **Ayat Fatima** *How Does pH Level Affect Color Pigments Extracted from Plants?*

JCHEM-205 **Shruthika Karthikeyan** *The Surprising Truths About Vitamin C*

JCHEM-206 **DeShawn Devine** *The Ripening of the Fruit*

JCHEM-207 **Musawer Saskai** *Can pH and Heat's Power Change a Substance's Solubility?*

JCHEM-208 **Ellee Sherpa** *Using Pennies to Test How pH Affects Copper Corrosion*

JCHEM-209 **Ahmet Yanar** *Hot or Not*

JCHEM-210 **Chelsea Ma** *Heat and Hair Protection*

JCHEM-211 **Mirabella Bernal** *Fatty Jackets*

JCHEM-212 **Calder Lee** *How Does Soil Affect Water pH Levels?*

JCHEM-213 **Elissa Ray** *Which Fizzes More: Homemade or Store-Bought Bath Bombs?*

JCHEM-214 **Jaydon Foulk** *Why Do Darker Colors Attract More Sunlight Than Lighter Colors?*

JCHEM-215 **Angel Kotlisky** *Rock Candy*

JCHEM-216 **Abdel Rahman El-Emawy** *Reaction In Action*

JCHEM-217 **Joseph Archibeque & Lilly Singer** *Boba Liquid*

JCHEM-218 **Johnny Titus Anaya & Modesto Lucero** *Which Liquid Will Rust the Nail the Fastest?*

JCHEM-219 **Mattea Contreras** *Which Candle Melts Fastest Under Sunlight?*

JCHEM-220 **Adrian Baca** *Cookie Science!*

JCHEM-221 **Jesus Dominguez** *A Comparative Study of Fruit Decomposition Rates*

JCHEM-222 **Ashley Nsiah** *Demonstrating Enzyme Catalase Activity Using a Potato and Hydrogen Peroxide*

JCHEM-223 **Krislyn Romero** *C-ing The Truth*

JCHEM-224 **Sophia Jimenez** *H₂O NO!*

JCHEM-225 **Diya Panchal** *Toxic Waters?*

Junior Computer Science

JCOMP-301 **Sahana Paruchuri & Elena Schwarz** *Beyond Accuracy: Brain Tumor AI - A Confidence-Calibrated Multi-Stage CNN for MRI Tumor Detection, Subtype Classification and Glioma Grading*

JCOMP-302 **Dominic Abeita** *How Long Do Different File Types Take to Open?*

JCOMP-303 **Mariam Elafandy** *Is Artificial Intelligence Trustworthy in Resolving Personal Conflicts?*

JCOMP-304 **Jeremy Anaya** *AI: Consistent or Creative?*

JCOMP-305 **Matthew Chavez** *Can Humans Recognize AI Images?*

Junior Earth & Environmental Sciences

JENVR-501 **Anaya Faruk** *The Orographic Oasis*

JENVR-502 **Sydney Kerr** *Fighting Liquid Rock: Testing the Power of Water Softening*

JENVR-503 **Sequoia Hopkins** *Biodegradable Bioplastics*

JENVR-504 **Ana Gomez** *Rivers vs Lakes: Which Has More Heavy Metals?*

JENVR-505 **Zoheb Barrantes** *Climate Change Simulation on Oyster Fungi Growth*

JENVR-506 **Aurie Gomez** *Painting for the Planet: Comparing Heat Reflection in Natural Eco-friendly Paints*

JENVR-507 **Rubi Nodal** *Making a Water Filtration System that Waters Gardens*

JENVR-508 **Seraphina Phillips** *The Green Spoon Campaign*

JENVR-509 **Zahra Suvarna** *Oasis-in-a-Pot*

JENVR-510 **Aadhya Asoori** *Nutrient Pollution Due to Fertilizers*

JENVR-511 **Morgan Ross** *Can the Same Plant Grow in Different Environments?*

JENVR-512 **Caroline Aldrich** *From Flames to Floods*

JENVR-513 **Genesis Behrend** *The Impact of Physical Compaction on Soil Porosity*

Junior Energy & Transportation

JTRAN-1101 **Joshua Sers** *Solar vs Battery Powered*

JTRAN-1102 **Dunya Abdelhack** *Wind to Watts*

JTRAN-1103 **Marla Zora** *The Power Pressured Car*

JTRAN-1104 **Charles Vigil** *Traffic, Traffic, Ahh More Traffic*

JTRAN-1105 **Derek Jacquez** *Need for Speed*

Junior Engineering

JENGR-401 **Clay Lu** *Clone CHT Nozzles: Worth It or Not?*

JENGR-402 **Paxton Shaw** *Make a Waterwheel With the Most Rotations Per Minute*

JENGR-403 **Heath Linam** *Designing and Building a Solar Powered Plane for Surveying Large Areas*

JENGR-404 **Gareth Jones** *Making a Generator That Uses Vortex Shedding to Convert Wind Energy Into Electricity*

JENGR-405 **Evan Olson** *Aerodynamic Performance of Folded Flying Objects*

JENGR-406 **Amelia Fondse** *Load Testing Which Bridge Ranges Strongest Out of Popsicle Sticks*

JENGR-407 **Christopher Armijo** *How Car Shape Affects Aerodynamic Velocity*

JENGR-408 **Ezekiel Dominguez** *Does the Design of the Blades on a Windmill Affect the Electrical Output?*

JENGR-409 **Austin Roberson** *Rocket Fins: What Type of Fin Is the Most Ideal?*

JENGR-410 **Andrea Yu** *Bridge Brawl: Which Shape Wins?*

JENGR-411 **Soumya Gullapalli** *Light Scattering: Can It Detect Microplastics?*

JENGR-412 **Robert Ortiz** *Home Aerodynamics*

JENGR-413 **Sylas Greene** *The Outperformer*

JENGR-414 **Daniella Aiwuyo** *Does a Truss Bridge Hold More Mass than a Beam Bridge?*

JENGR-415 **Isabella Hernandez** *Water Warfare*

JENGR-416 **Liam Alexander** *Which Boat Is the Best?*

Junior Materials Science

JMATS-601 **Aylara Mills & Pazel Yarrington** *The Great Orbeez Grow-off*

JMATS-602 **Jeremy Smith** *Plastic in Soda Cans?*

JMATS-603 **Amaanah Vahab** *How Does the Material Affect the pH of Water?*

JMATS-604 **Theodore Ligon** *Saltwater Salt Removal*

JMATS-605 **Amana Khraishi** *The Effect of Eggshell Powder in a Composite on Mechanical Properties*

JMATS-606 **Jonathan Shockley** *Functional Ferrofluids*

JMATS-607 **Cruz Xie** *Movement in Goopy Liquids*

JMATS-608 **Taylor Nguyen** *What Color Shirt Dries Fastest in the Sun?*

JMATS-609 **Jaidyn Sandoval** *Which Filtration Material Leads to the Best Drinking Water?*

Junior Medicine & Health Sciences

JMED-H-701 **Elijah Girroir** *What Technique Is Best to Reduce Heart Rate and Blood Pressure after an Intense Workout?*

JMED-H-702 **Suzanna Ansari** *The Thermal Trigger: Unravelling Temperature's Role in Anesthesia*

JMED-H-703 **Glory Landavazo** *Acidic Medicines*

JMED-H-704 **June Crawford** *Under Pressure: The Power of Smell*

JMED-H-705 **Daniel Aragon** *The Whitening War*

JMED-H-706 **Meena Adeeb** *Hand Grip Strength Tester*

JMED-H-707 **Erin Duselis** *Simulating Genetics*

JMED-H-708 **Ashvita Prasankumar** *A Change of Heart: Predictive Modeling of Heart Disease Risk*

JMED-H-709 **Elizabeth Williams** *Memory and Input: Risks of Aging*

JMED-H-710 **Aayah Momani** *Can Peppermint Oil Improve Reaction Times?*

Junior Microbiology

JMICRO-801 **Habbas Awawda** *Hand Drying*

JMICRO-802 **Aariv Agrawal & Isaac Sewell** *Which Natural Antimicrobials Inhibit Bakers Yeast the Best?*

JMICRO-803 **Abigail Oetzel** *Is the 5-Second Rule Actually Real?*

JMICRO-804 **Asma Jamaledin** *Comparing Hand Cleaning Methods*

JMICRO-805 **Oscar Groves** *Microbial Growth in Your Rice, You Can't B Cereus?*

JMICRO-806 **Emily Quintana** *Can Microbes Survive in Acidic Water?*

JMICRO-807 **Serenity Campos** *The Effect of Heat on Bacteria*

JMICRO-808 **Dylan Martinez** *Bioluminescence!*

Junior Physics & Astronomy

- JPHY-901 **Seamus Brown & Thomas Farrow** *Which Types of Shoe Treads Have the Best Traction?*
- JPHY-902 **Claire Lee** *Does Magnification Affect Chromatic Aberration in Cameras?*
- JPHY-903 **Lev Daugherty** *A Study of Ballistics*
- JPHY-904 **TeVIn McVay** *Hot Versus Cold Bounce*
- JPHY-905 **Anna Kalugin** *Light Emission of Fluorescent Materials*
- JPHY-906 **Autumn Nguyen & Thomas Quirk** *Space Pizza Phase 1: Quantifying High-Altitude Radiation and Environmental Parameters*
- JPHY-907 **Ruthvik Quadros** *How Does Nosecone Geometry Affect Hypersonics in Consideration of Volume and Velocity?*
- JPHY-908 **Ethan Cochran** *Resistance of Different Graphite Pencil Leads*
- JPHY-909 **Omar Babaa** *Mighty Electromagnet*
- JPHY-910 **Maximilian Hiris** *What Ramp Angle Makes a Toy Car Go the Fastest?*
- JPHY-911 **Alexander Riley** *How Will the Temperature of a Tennis Ball Affect the Height it Bounces?*
- JPHY-912 **Scarlett Groves** *Star Light, Star Bright, the Importance of White Light: The Search for Water on Distant Planets*
- JPHY-913 **Tanis Fortier** *Blocking Wi-Fi Signals*
- JPHY-914 **Joseph Carlin** *Messages in the Mesh*
- JPHY-915 **Dwight Crozier-Molina** *How Do Weights Affect Model Rockets?*
- JPHY-916 **Ethan Goodlander** *Inverter Magnet-Tractor Beam*
- JPHY-917 **Levi Torrez** *How Do Tornadoes Form?*
- JPHY-918 **Frank Romero** *Hitting in Motion: How Speed Affects Baseball Distance*
- JPHY-919 **Aryan Patel** *The Effect of Three Years of Non-Use on Solar Panel Open Circuit Voltage*
- JPHY-920 **Brooke Shelland** *Is It Worth It: Name Brand Versus Generic Brand Using a Study on Thermal Retention*

Junior Plant Science

- JPLANT-1001 **Jesvitha Pulagura** *Can Biodegradable Hydrogels Help Conserve Water in Farming?*
- JPLANT-1002 **Liam Rust** *How Does Water Temperature Affect Seed Germination Rates?*
- JPLANT-1003 **Camylle Hubbard** *Sunflowers Using Photosynthesis for CO₂ Absorption*
- JPLANT-1004 **Alyssa Morales** *How Do Magnets Influence Plant Growth?*
- JPLANT-1005 **Cruz Martinez** *H₂-Oh*

JPLANT-1006 **Emily Claudet** *Fertilizer Frenzy*

JPLANT-1007 **Jayden Saenz & Mira Thompkins** *War of the Roses: A Comparison Between Extraction of Rose Water and Oil from NM Roses vs Bulgaria*

JPLANT-1008 **Sofia Beverido** *Creating a Symbiosis With Plants to Make Hydrogen for Space Travel*

JPLANT-1009 **Annah Sarmiento** *Can I Extract DNA from Fruits?*

JPLANT-1010 **Riley Clifton** *Cool Beans*

Senior Animal Science

SANI-1201 **Evan Schleicher** *Does Human Influence Affect Wildlife Activity?*

SANI-1202 **Brian Jolly** *How Intelligent Was the Tyrant Lizard King of the Cretaceous: The Tyrannosaurus Rex?*

SANI-1203 **Chloe Bagley & Taylee Sorensen** *Color Dye Preferences: Crickets and Mealworms*

SANI-1204 **Aurora Terwilliger** *Russian Tortoise Environment Preference*

SANI-1205 **Ryan Nguyen** *Gastropod Biomineralization and Water Chemistry*

Senior Behavioral & Social Sciences

SBEH-1301 **Annabelle Bean & Alessandra Murrietta** *Multitasking*

SBEH-1302 **Miranda Garcia** *Comparative Analysis of Breathing Techniques for Heart Rate Stabilization in Teens*

SBEH-1303 **Laken Mills** *Effect of Human Senses on Stress Relief*

SBEH-1304 **Antonio Pacheco & Maddox Pinzon** *Custom Adaptive Utensils*

SBEH-1305 **Peyton Arvizo & Cassidy Colvin** *How Music Affects Movie Viewers*

SBEH-1306 **Zachary Friedenstein, Jaise Gattuccio & Colin Goldizen** *Video Games Correlation to Heart Rate*

SBEH-1307 **Azul Nava-Gomez** *AI vs Chef*

SBEH-1308 **Ariana Karnes & Esha Shivashankar** *How Different Foods Impact Athletes Energy Levels*

SBEH-1309 **Katie Aragon** *Small Changes, Big Results: An Examination of Bias and Its Effect on Data*

SBEH-1310 **Ava O'Connor & Emma Smouse** *How Does the Beats Per Minute (BPM) in a Song Change Your Running?*

SBEH-1311 **Daveany Lohr** *Generational Differences in Identifying AI, Student and Journalist Written Articles*

SBEH-1312 **Tam Pham** *Cultural Identity, Coping and Mental Health: Suicidal Ideation in AAPI Youth*

Senior Biology & Microbiology

SMICRO-2101 **Peyton Kerr** *Targeting Biofilm Resistance: Comparative Efficacy of Hydrogen Peroxide, Acetic Acid, Medical Honey, Dakin's Solution and EDTA Against Baker's Yeast*

SMICRO-2102 **Madeline Leymon** *Natural Antibacterials in Canine Oral Health*

SMICRO-2103 Eric Gilbert & Britnie Robertson *Finding Anti-microbial Properties in Invasive Species for Medicine*

SMICRO-2104 Rylan Garcia & Catherine Tigert *A "Light" Dose of L-DOPA: Investigating the Biological Effect of the Light Spectrum on Enzyme Reactions*

SMICRO-2105 Alawna Wittner *UV-B Affects on Yeast DNA Damage/Repair*

SMICRO-2106 Rachel Taylor *A Fun Time With A Fungi: Simulation Neuronal Galvanotropism on Ustilago maydis Mycelium to Manipulate Cell Growth, Direction, and Cell Development and Its Applications to Nerve Regeneration*

SMICRO-2107 Paul Cammarata *Yeast Beast*

Senior Chemistry

SCHEM-1401 Maleah Brashear *Is Expired Aspirin Still Effective?*

SCHEM-1402 Raine Hill & Abigail Nannemann *How Temperature Affects Carbonation in Drinks*

SCHEM-1403 Silas Etuk *Rust Removers*

SCHEM-1404 Armaan Vahab *Which Type of Water - Bottled, Universal Home Filtered or Tap Water Has the Best Quality for Drinking Based on TDS?*

SCHEM-1405 Ahana Koushik *Development of a Rapid, Portable Lateral Flow Assay for the Detection of Microplastic-drug Interactions*

SCHEM-1406 Josiah Smith *Colorful Liquid Density Gradient*

SCHEM-1407 Aiden Martinez *Colorful Fire*

SCHEM-1408 Omar Terrazas *Can You "C" It?*

Senior Computer & Mathematical Sciences

SCOMP-1501 William Arnold *USB Data Security Suite: Encryption, Hidden Storage and Self-destruct Mechanism*

SCOMP-1502 Arjun Grandhe *Where Gravitational Waveform Models Break Down: A Phase-by-Phase Analysis of LIGO Signals*

SCOMP-1503 Xavior Chacon & Keyelle Sutton *Transforming Platonic Solids*

SCOMP-1504 Carlos Serna & Billy Vuong *The Correlation Between Weather Irregularities and Stock Market Fluctuations*

SCOMP-1505 Joy Boydston & Daymon Pomeroy *The Reparability of Pi and Tau*

Senior Earth & Environmental Sciences

SENV-1801 Sreenisha Prabu *Impact of Polystyrene Microplastics Exposure on Mitochondria Morphology and Oxidative Stress in Microglial Cells*

SENV-1802 Layla Dees & Ray Samuel *Finding a Way to Recycle Excess Plant Water*

SENV-1803 Kenneth Lopez *Material Heat*

SENR-1804 Declan Padget *Do Microplastics Increase the Bioavailability of Toxic Chemicals Such as Heavy Metals or Pesticides to Aquatic Organisms?*

SENR-1805 Hamsini Murali *Tiny Plastics, Big Effects: Effects of Microplastics on Molecular Diffusion in Simulated Gut and Marine Environments Measured Through Absorbance and Mass Change Using Dialysis Tubing*

SENR-1806 Emma Hansen & Emma McGee *Testing Rivers in New Mexico: How Contaminated Are Our Waters Before and After Purification?*

SENR-1807 Adam Briceno Gabauer & Nicole Briceno Gabauer *Hydropods*

SENR-1808 Charlie Groves *Aerosolized Microplastics and Their Microbiome: "Plastisphere" the New Super Villain in the Atmosphere*

SENR-1809 Daniel Chavez-Williamson *To Seed or Not to Seed: The Question Behind How Shade, Moisture and Plant Availability Influence Ant Seed Choices and Restoration Planning*

Senior Energy & Transportation

STRAN-1701 Orion Gonzales *Dual-Axis Solar Tracking: A Comparative Study Using 3D Printed Designs*

STRAN-1702 Keira Gray *Which Rear-Wing Design Will Provide the Best Effects of the Balance Between Drag Reduction and Downforce in Formula 1 Racing?*

STRAN-1703 Achilles Orpinel-Padilla *Harvesting Energy Through Waves in a Mechanical Prototype*

Senior Engineering

SENGR-1601 Annika LeBaron *Thrust Efficiency of Novel Propeller Designs*

SENGR-1602 Trinity Peterson *Evaluation of Efficiency of Thermal Desalination at Different Pressures*

SENGR-1603 Aidan Panturad & Matthais Trujillo *Thermal Shock and Ablation Resistance of Hypersonic Surface Materials: A Comparative Experimental Study*

SENGR-1604 Charissa Alex-Bature & Sally Moreno *Developing an Affordable and Easily Accessible Braille Printer*

SENGR-1605 James Hung *Energy-Efficient Thermal Management in Electric Vehicle Batteries Using Graphite: An ANSYS Simulation Approach*

SENGR-1606 Maxim Stout *Designing an Oscillatory Nanofluid-Cooled Heat Exchanger*

SENGR-1607 Ameen Asfan *Help With Reading for People With Visual Impairments: Creating a Low-Cost Device that Reads Text to Aid the Visually Impaired*

SENGR-1608 Oen Martinez *Computational Evaluation of Custom Heat Sink Geometries Using OpenFOAM and Parametric 3D Modeling*

SENGR-1609 Agustin Cordova *Designing and Testing a Thermoelectric Cooling System for Off-Grid Refrigeration*

SENGR-1610 Caleb Jacka *Investigating the Effects of Adding Dimples to Cars*

SENGR-1611 Henry Bullock & Makaylah Priddy *Calming the Click: Making a Microphone Filter to Reduce Clicking in Instrument Recordings*

SENGR-1612 Adan Corral & Jordan Mitchell *Designing the Most Efficient Helmet Cooling System*

SENGR-1613 Elijah Lopez *Physical Entropy Generation for Quantum Resistant Cryptography*

SENGR-1614 Chloe Garcia *Snooze in Silence*

SENGR-1615 Sam Stafford *The Double Slit Experiment: In a New Light*

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SENGR-1622 Kenan Star *Solar Powered Semi-Automated Irrigation System for Pueblo Farmers*

SENGR-1623 Emily Rodriguez *Accelerating the Performance of a Rocket*

Senior Materials Science

SMATS-1901 Edward Bielejec *Analysis of a Cold-Induced Infrared Thermography (IRT) Non-Destructive Testing (NDT) Methodology for Defect Dimension Determination, Using Finite Element Analysis (FEA) and Machine Learning (ML)*

SMATS-1902 Asa Hoover & Maddeaux Sanchez *How Do Stacked 2D Materials (graphene + MoS₂) Enable Control of Electrical Properties in Next-generation Transistors*

SMATS-1903 Henry Lopez *Will It Beat the Heat? The Best Electrical Tape for Use in Color Guard Marching Bands*

SMATS-1904 David Brooke *Developing a Fuel-Independent, Fresnel Lens-Based, Ebullition Apparatus Intended for Use in the Backcountry*

SMATS-1905 Christopher Abney *Apex of Rocket Bodies*

SMATS-1906 Laasya Tutiki *Optimizing siRNA-Curcumin Nanotherapeutic Codelivery*

SMATS-1907 Stephen Mangu *Evaluating the Thermal Resistance and Efficiency of Mycelium-Based Insulation Compared to Conventional and Sustainable Insulators*

Senior Medicine & Health Sciences

SMED-H-2001 Kylee Baker & Naomi St. Clair *Environmental Impact of Disposable Menstrual Products: A Comparative LCA of Synthetic and Organic-Based Materials*

SMED-H-2002 Isabella Perea & Maysyn Thomas *The Makeup Microbiome*

SMED-H-2003 Abbygale Gonzales & Payton Koschade *Eggshell Evidence: Comparing Beverage Staining and Erosion on a Tooth Enamel Model*

SMED-H-2004 Gianna Girroir *Microbiome GI Tract Probiotic Impacts*

SMED-H-2005 Noah Lovato & Rachel Rede *The Effects of Food Sequencing on Blood Glucose*

SMED-H-2006 Gaganasree Munaga *Simulating Neurological Signal Delay from Traumatic Brain Injury (TBI)*

SMED-H-2007 Aiden Breeze *Does Hand Washing Time or Technique Matter More Than the Type of Soap?*

SMED-H-2008 Gael Zeller *Algorithmically Predicting Rare Disease Risk Using PRS(Polygenic Risk Scores) and Environmental Modifiers*

SMED-H-2009 Rex Gould *How Do Sugar and Artificial Sweeteners Affect the Human Body?*

SMED-H-2010 Trenton Pitz *Superhero Taste Buds*

SMED-H-2011 Aanya Asoori *RetinaVision: AI Powered Detection of Retinitis Pigmentosa and Other Retinal Diseases from Fundus Images*

SMED-H-2012 Aditi Ganti *Multi-Scale Evolution-Aware Antibiotic Design: Discovering Resistance-Robust Drug Candidates Through Phenotypic Integration and Causal Interpretability*

Senior Physics & Astronomy

SPHY-2201 Anna Arackal & Sarah Martinez *The Perfect Room*

SPHY-2202 Franchesca Caruth *Skates in Motion! How Different Surfaces Affect Jumps on Ice Skates vs Rollerblades*

SPHY-2203 Isaac Ottesen *Effects of Textiles on the Frequency Perception of a Loudspeaker*

SPHY-2204 Kira Schubert *How Does the Structural Integrity of Internal Resonance Chambers Affect Overall Sound Quality and Duration?*

SPHY-2205 Hailey Anglin & Riley Anglin *The Slippery Slope: Water's Effect on Goalkeeper Gloves*

SPHY-2206 Madelyn Flint *Friction in Action: The Physics Behind Sneaker Grip*

SPHY-2207 Jayden Lucero & Deondre Tafoya *Engineering Homemade Baseballs: Effects of Material Density on Momentum, Bounce and Drag*

SPHY-2208 Alex Friedt *Beyond Flattened Whirlpools: How 3D Simulations Reveal Hidden Vortices in Flood Models*

SPHY-2209 Destiny Montano *Exoplanet Transit Model*

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SPLANT-2301 Yzianna Loreen Quitan *Effects on Light Spectra on Total Chlorophyll Content and Growth of Arugula*

SPLANT-2302 Emma Bachtel *Determining the Best Aromatic Plant for Wet and Humid Conditions to Stop Aphid Infestations in Taiwan*

SPLANT-2303 Aspen Ly & Farah Thiam *Can Homemade Artificial Cuticles Help Improve the Amount of Water Being Retained in Plants?*

SPLANT-2304 Noah Anaya & Adalae Call *Waste Product in Agriculture? Determining the Optimal Ratio of Coconut Husk: Desert Soil for Growing Plants in the Desert*

SPLANT-2305 Saideetya Chinala *Effects of Graywater on Plant Growth*

SPLANT-2306 Julia Koshkin *Hydroponic Stress Test for Cellular Resilience*

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SPLANT-2308 Wence Asonganyi *Fruit Fast Forward: Accelerating Fruit Ripening*

SPLANT-2309 Lauren Buford & Allyson Tennent *How Do Inorganic and Organic Fertilizers Affect the Growth of the Radishes and the Nitrate Levels in the Soil's Ground Water?*

SPLANT-2310 Makalo Richmann *World's Softest Plant: How to Optimize Softness*

SPLANT-2311 Jacob Shije-Jackson *Hydroponics Crop Yield and Water Efficiency*

SPLANT-2312 Felix Jeantete *How Can Bacteria Be Beneficial to Plant Growth? The Future of Agriculture*

SPLANT-2313 Bridget Braun *The Effect of Surfactants on Seed Germination*

Senior Robotics & Intelligent Machines

SROBO-2401 Sowmya Sankaran *Characterizing Cognitive Dynamics in AI: A Comparative Analysis of Persona-Driven Behavior in Individual and Collaborative Agentic Systems*

SROBO-2402 Tri Le *Predicting Air Pollution Using Orange Data Mining*

SROBO-2403 Anderson Stoker *Constructing a Robust Flexible Locomotion System for Use on Variable Terrain in Extraterrestrial Environments*

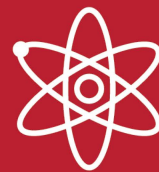
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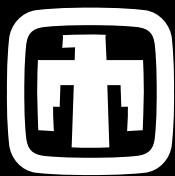
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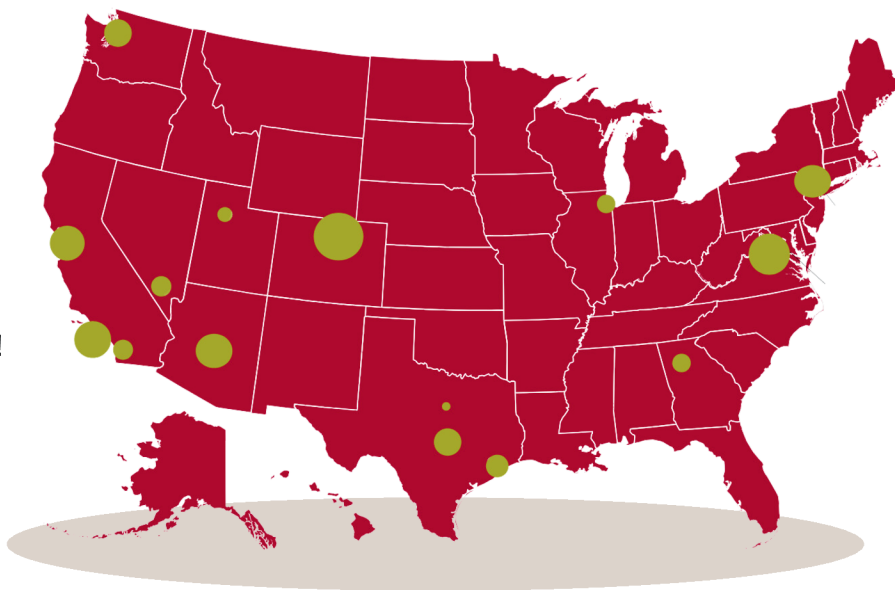


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03.



04.



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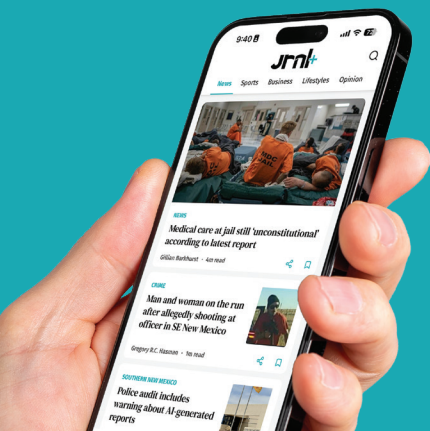
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