The Governor's School @ Innovation Park

A STEM INITIATIVE IN COLLABORATION WITH GEORGE MASON UNIVERSITY

Prince William County Public Schools · Manassas City Public Schools · Manassas Park City Public Schools

2024-2025 School Profile

Jason Calhoun, Ph.D., Director

The Governor's School at Innovation Park (GS@IP) is a specialized regional center for the advanced study of science, technology, engineering and mathematics, serving students in grades 11 and 12 from the Manassas Park City Public School, Manassas City Public School, and Prince William County Public School Divisions. The vision shared by GS@IP faculty and participating school divisions is to allow students to encounter a range of opportunities encouraging intellectual and academic excellence. GS@IP is a member of the National Consortium of Secondary STEM Schools (NCSSS).

Mission Statement

The mission of GS@IP is to engage students in rigorous academic study, challenge them to acquire knowledge, develop understanding, think reflectively, and take intellectual and creative risks in problem solving for the benefit of the Earth.

About GS@IP

- Established in 2010 as Virginia's 19th Academic-Year Governor's School, GS@IP is governed by a Joint Board comprised of representatives from Manassas City Public Schools (MCPS), Manassas Park City Public Schools (MPCS), Prince William County Public Schools (PWCS) and George Mason University (GMU).
- Our school is housed on George Mason University's SciTech (Manassas) Campus, located in the western portion of Prince William County, Virginia. All courses (except Innovations) are offered for college credit through dual enrollment with GMU.
- GS@IP provides a two-year shared-day program to 166 gifted and academically motivated students from three participating school divisions, which consists of fifteen high schools.
- Students attend morning classes at The Governor's School, then return to their home school for their other required courses, electives, and extracurricular activities. This allows students to remain active at their base high schools while our program provides them with like-minded colleagues and rigorous academic courses.

Admissions

In order to attend The Governor's School, students undergo a rigorous and competitive application process. We seek college-bound students in the top 15 percent their class who are creative, self-motivated, high-achievers looking for a level of challenge in STEM-related fields beyond what is offered at most high schools.

Curriculum

All courses are taught at the AP, post-AP, or dual enrollment level. The rigorous instructional design of the program focuses on learning styles of gifted and talented students and integrates strands in biology, chemistry, engineering, and physics with mathematics, additional concepts from engineering and technology, and laboratory research. Learning experiences focus on real-world research with mentorship opportunities in business, industry, government, and university settings. Principles of Technology and Engineering allows students to experience the engineering design process, work collaboratively and collectively with peers, as well as learn core skills utilized in all engineering disciplines.

Mentorship/Internship

The GS@IP mentorship/internship program allows students to conduct inquiry-based research and/or project development working with the support of experts from corporate, university, and government institutions throughout the metropolitan Washington D.C. area. Students are guided by mentors who are accomplished scientists, engineers or other technical professionals working at these agencies. The mentorship program provides a collaborative option for dedicated students to fulfill their required research projects. Agencies supporting student project development or research by providing mentors and/or funding have included: BAE; George Mason University College of Science and Volgenau School of Engineering; Jewell Technology Consultants; Novant Health/PW Hospital; ECS; Aerojet; Aurora Flight Sciences; Dominion Power; Lockheed Martin; Micron; Dewberry; ECS Mid-Atlantic; PWC Government; Pangea-Global; Assett, Inc.; Dewberry; SAI Engineering, AVER Technologies and Progeny Systems.

Student Research and Product Development

Student research and product development are required components of coursework at GS@IP. Students display and discuss their work at an Annual Research Symposium. The Symposium is held in late May at the George Mason University SciTech Campus.

Project categories include: Animal Sciences (AS) Biochemistry (BI) Cellular and Molecular Biology (CB) Chemistry (CH) Computer Science (CS) Engineering: Electrical and Mechanical (EE) Materials and Bioengineering (EN) Environmental Management (EM) **Environmental Sciences (EV)** Medicine and Health Sciences (ME) Microbiology (MI) Physics, Astronomy and Robotics (PH)

GS@IP student work has been awarded recognition at local, state, national and international levels including: Regional, Virginia State, and International Science and Engineering Fairs; Virginia CyberChallenge; VA Junior Academy of Science, Ocean Bowl Challenge; Real World Design Challenge, International Space Olympics, NASA Real World-In World Engineering Challenge, Verizon App Challenge, and Siemens We Can Change the World Challenge, amongst others.

Coursework

Junior Courses

Pre-Calculus*; Calculus I/II*

Biology I/II*: Chemistry I/II*: College Physics I/II*

Principles of Technology and Engineering – options include:

- Computer Science*; Introduction to Engineering*,**;
- Inventions and Innovations
- Mentorship or Independent Research* Practicum in Engineering*,**

Senior Courses

Calculus I/II*; Multivariable Calculus* / Linear Algebra*

Microbiology* / Anatomy & Physiology*

Organic Chemistry* / Environmental Chemistry* University Physics I/ II*,**

- Statics*,**; Mechanics, Thermodynamics or Dynamics*,**
- Principles of Technology and Engineering options include Computer Science*; Geomatics and Engineering Graphics*; Inventions and Innovations; Bioengineering*; Computing for Scientists*

The Governor's School @ Innovation Park Located on the Science & Technology Campus of George Mason University, Colgan Hall 301, MS 6D10, Manassas, VA 20110-2203 Telephone 703.993.7027 Website: https://governors.pwcs.edu Twitter: @Gov_School_IP

Mentorship or Independent Research*

*Course offered for dual enrollment through George Mason University. **Engineering Thread

Grading Scale

The Governor's School @ Innovation Park and GMU use the following grading scale:

- A Excellent (90-100)
- B Above average (80-89)
- C Average (70-79)
- D-Below average (60-69)
- F Failure (0-59)
- I Incomplete

Students at The Governor's School @ Innovation Park must pledge to abide by both the public school systems' Honor Codes as well as George Mason University's Honor Code.

Class Rank/Percentile

Class rank and percentile is not computed or estimated at the GS@IP.

Average SAT Scores (GS@IP Class of 2023)

	Mathematics	Reading & Writing
GS@IP	682	653
Virginia	552	572
National	521	529

GS@IP College & University Acceptance Data (Class of 2024 Data)

American University (AU) - Washington, D.C. Arizona State University – Tempe, AZ Bentley University - Waltham, MA Binghamton University - Binghamton, NY Boston College - Boston, MA Boston University - Boston, MA Bowdoin College - Brunswick, ME Bridgewater College – Bridgewater, VA Carleton College - Northfield, MN Carnegie Mellon University – Pittsburgh, PA Case Western Reserve University - Cleveland, OH Catholic University - Washington, D.C. Christopher Newport University (CNU) - Newport News, VA Claremont McKenna College – Claremont, CA Clemson University - Clemson, SC Colorado School of Mines Columbia University - New York, NY Cornell University – Ithaca, NY Delaware State University (Del State) - Dover, DE Drexel University – Philadelphia, PA Duke University – Durham, NC Duquesne University – Pittsburgh, PA Embry-Riddle Aeronautical University - Daytona Beach, FL Florida Atlantic University - Boca Raton, FL George Mason University (GMU) - Fairfax, VA George Washington University (GW) - Washington, D.C. Georgetown University - Washington, D.C. Georgia Institute of Technology (Georgia Tech) – Atlanta, GA Gettysburg College – Gettysburg, PA Grinnell College – Grinnell, IA Hamilton College - Clinton, NY Hampton University - Hampton, VA Harvey Mudd College - Claremont, CA Howard University - Washington, D.C. Illinois Institute of Technology (Illinois Tech) - Chicago, IL Ithaca College – Ithaca, NY James Madison University (JMU) - Harrisonburg, VA Loyola Marymount University – Los Angeles, CA Manhattan College – Bronx, NY Miami University (OH) – Oxford, OH Milwaukee School of Engineering – Milwaukee, WI Minerva University – Sam Francisco, CA Mississippi State University – Mississippi State, MS Montana State University – Bozeman, MT

North Carolina A&T State University (NCAT) - Greensboro, NC North Carolina State University (NC State) - Raleigh, NC Northeastern University - Boston, MA Northern Arizona University – Flagstaff, AZ Old Dominion University (ODU) - Norfolk, VA Oregon State University - Corvallis, OR Pennsylvania State University (Penn State) - University Park, PA Purchase College - Purchase, NY Purdue University - West Lafyette, IN Randolph-Macon College – Ashland, VA Rensselaer Polytechnic Institute (RPI) - Troy, NY Rochester Institute of Technology (RIT) – Rochester, NY Rowan University – Glassboro, NJ Rutgers University - Camden – Camden, NJ Rutgers University - New Brunswick – New Brunswick, NJ Rutgers University - Newark – Newark, NJ Santa Clara University – Santa Clara, CA Seton Hall University – South Orange, NJ Siena-Albany Medical College (BS/MD) – Loudonville, NY Smith College – Northampton, MA Southern Methodist University (SMU) - Dallas, TX Spelman College – Atlanta, GA State University of New York - Buffalo (University at Buffalo) – Buffalo, NY State University of New York - Stony Brook (Stony Brook University) - Stony Brook, NY Syracuse University – Syracuse, NY Temple University – Philadelphia, PA Texas A&M University - College Station, TX The Ohio State University (Ohio State) - Columbus, OH Tuskegee University - Tuskegee, AL University of Alabama – Tuscaloosa, AL University of Alaska - Fairbanks – Fairbanks, AK University of Arizona – Tucson, AZ University of California - San Diego - San Diego, CA University of California - Santa Cruz – Santa Cruz, CA University of Colorado - Boulder - Boulder, CO University of Delaware - Newark, DE University of Florida – Gainesville, FL University of Georgia (UGA) – Athens, GA University of Hawaii - Manoa - Manoa, HI University of Illinois - Urbana Champaign – Champaign, IL University of Mary Washington - Fredericksburg, VA University of Maryland - Baltimore County (UMBC) - Baltimore, MD University of Maryland - College Park – College Park, MD University of Maryland - Eastern Shore – Princes Anne, MD University of Massachusetts - Amherst - Amherst, MA University of Miami – Miami, FL University of Michigan - Ann Arbor - Ann Arbor, MI University of Minnesota - Twin Cities - Minneapolis, MN University of Oregon – Eugene, OR University of Pennsylvania (Penn) – Philadelphia, PA University of Pittsburgh (Pitt) - Pittsburgh, PA University of Rochester - Rochester, NY University of South Carolina - Columbia, SC University of South Florida (USF) - Tampa, FL University of Southern California (USC) – Los Angeles, CA University of Texas - Dallas – Dallas, TX University of Vermont – Burlington, VT University of Virginia (UVA) – Charlottesville, VA University of Washington - Seattle, WA University of Wisconsin - Madison - Madison, WI Vassar College – Poughkeepsie, NY Virginia Commonwealth University (VCU) - Richmond, VA Virginia Polytechnic Institute and State University (VA Tech) – Blacksburg, VA Virginia State University (VSU) - Petersburg, VA Virginia Wesleyan University – Virginia Beach, VA Washington and Jefferson College - Washington, PA Washington and Lee University (Wash Lee) – Lexington, VA Washington State University - Pullman, WA Washington University (Wash U) - St. Louis, MO Wesleyan University – Middletown, CT West Virginia University (WVU) - Morgantown, WV Western Carolina University – Cullowhee, NC William & Mary (W&M) – Williamsburg, VA Williams College - Williamstown, MA Worcester Polytechnic Institute (WPI) – Worcester, MA Yale University - New Haven, CT

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