Wallops Flight Facility
“goes to where the science is…”

INTERNATIONAL SPACE STATION
205-250 miles

EXPELABLE LAUNCH VEHICLE
Low-earth orbit

OCEAN TO THE MOON
WALLOPS DELIVERS

SOUNING ROCKETS
Up to 900 miles

BALLOONS
Up to 120,000 feet

UAV
Up to 65,000 feet

AIRBORNE SCIENCE
Up to 30,000 feet

OPERATIONAL SITES

IN-SITU SCIENCE

ENGINEERING - ORBITAL TRACKING - EARTH AND OCEAN SCIENCE - SAFETY - EDUCATION
NASA Education Flight Projects

Authentic Technology and Engineering Experiences
WFF Internships

32 WFF Education summer interns selected for 2014

In addition at WFF, there are 17 Pathway Interns and 14 contract interns.

WFF Pathway Internship available September 29, 2014 on www.usajob.gov

Education Interns working Antares Launch

Education, Pathways and Contract Interns
FY 2014 Results

**Educator Professional Development**
87 Educators participated from 11 states and will reach 6,900 students
- Teacher Workshops conducted: WRATS, VA inSTEP Preservice, HS3/GPM/SMAP

**Student STEM Opportunities**
782 Students participated in WFF Education Opportunities
- Virginia Space Coast Scholars (VSCS): 254 high school sophomores completed online modules; 90 participated in 2 WFF academies
- Robotics Alliance – FIRST Robotics, VEX, Advanced Robotics Academy
- RockOn – 65 students; RockSatC – 35 students; Cubes in Space – 100
- 10 USIP (Undergraduate Student Instrument Project) – 106 students and 14 faculty; launched or are preparing to launch on suborbital platforms

**Collaborations with School Districts and Higher Education**
- Collaborations with Eastern Shore universities/colleges and school districts
Wallop's Flight Facility utilizes its Visitor Center to provide viewing opportunities for the public any time of day to view suborbital and orbital launches

Visitors Center Stats: 48,207 visitors YTD (CY2014)
The primary goal is:
• To provide a hands-on flight project experience to enhance the science, technical, leadership, and project skills for the selected U.S. university undergraduate student team.

The secondary goal is:
• To fly a science payload having a purpose relevant to the Science Mission Directorate’s science goals (http://nasascience.nasa.gov/) 10 proposals were funded in FY14.
## Undergraduate Student Instrument Project (USIP)

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<tr>
<th>NASA Suborbital Platforms</th>
<th>Universities</th>
<th>Projects</th>
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| **Scientific Balloon**    | University of Virginia  
Utah State University  
Catholic University  
University of Houston (weather balloon)  
Gannon University (small balloon) | Test CubSat with micro dosimeters  
Intensity emissions data in the 630 nm band  
Real-time attitude determination system  
Smartphone technology to study ionosphere  
Detect cosmic rays in energy range ~1-100 |
| **Parabolic Flight**      | Carthage College  
University of Central Florida | Test technique for measuring mass of liquid  
Test adhesion at low collision velocities |
| **Sounding Rocket**       | West Virginia University | Ionospheric response to interplanetary magnetic storms |
| **Airborne Science Aircraft** | Louisiana State University | Sample microbial aerosols up to 5 altitude ranges |
| **Commercial Carrier (Masten Xombie)** | Carnegie Mellon University | Test mapping instrument to characterize pits, crater, and convex features in flight |