OVERVIEW

Virginia received $56.2 billion in Defense spending in Fiscal Year (FY) 2018, which provides direct funding for DoD personnel salaries, defense contracts, and construction of military facilities in the state. This spending by DoD personnel, contractors, and their families creates significant economic activity, attracts related industries and investment, and generates important state and local government tax revenues.

The Readiness and Environmental Protection Integration (REPI) Program is a key tool used by DoD and its partners to protect the military’s ability to train, test, and operate in the state. DoD created the REPI Program in response to the development of lands and loss of habitat in the vicinity of or affecting its installations, ranges, and airspace that can lead to restrictions or costly and inadequate training and testing alternatives. Through REPI, DoD works with state and local governments, conservation organizations, and willing private landowners to address these challenges to the military mission and the viability of DoD installations and ranges. The REPI Program has enjoyed broad bipartisan support both in the U.S. Congress and among groups representing state and local officials. Through FY 2019, DoD and its partners have spent nearly $145 million on REPI projects at 8 installations in Virginia.

* REPI projects refer to any action authorized by 10 USC §2684(a) to include the acquisition of interests in land from willing landowners to prevent incompatible development and protect habitat or any other natural resources management. REPI projects involving the Army or Army National Guard are also termed Army Compatible Use Buffer (ACUB) partnerships. Those involving the Navy, Marine Corps, or Air Force, are also termed encroachment partnering agreements. Eligible partners include conservation organizations and state and local governments.
MILITARY PRESENCE

- Military spending accounts for 44% of all federal spending in Virginia.
- Fort Lee is the primary generator of the local economy with a $2.4 billion economic output representing 13.68% of the region's GDP.
- Hampton Roads is home of the largest Navy Base and has over 16 bases surrounding the area. Every branch of the military has a presence in Hampton Roads, and the region's 100,000 plus active-duty and reserve personnel is second only to the Pentagon. Additionally, over 40,000 civilian personnel are employed on military bases in Hampton Roads. The economic value to the Naval Air Station Hampton Roads mission locality is $1.5 billion.
- The economic value to the Naval Air Station Oceana Mission locality is $1.1 billion annually.
- Fort Pickett is the economic engine for the Blackstone area. It is the largest employer and primary tax revenue generator.
- The economic value to the Marine Corps Base Quantico locality is $3.2 billion in direct impact, and $5.9 billion in direct and indirect impact.
- Established in 1915, Fort Belvoir is home to the headquarters of the Army Intelligence and Security Command and the Army Criminal Investigation Command, as well as 19 other agencies of the Department of the Army, eight elements of the Army Reserve and Army National Guard, and 26 DoD agencies.
- Joint Expeditionary Base Little Creek-Fort Story covers nearly 4,000 acres of land with 7.6 miles of beachfront area for the Amphibious Forces in the Navy’s Atlantic Fleet.
- DoD spending per capita in Virginia is the highest in the nation. In Virginia, the defense industry generates over $100 billion in total economic impact supports nearly 885,000 jobs across the state.

REPI PROJECTS

<table>
<thead>
<tr>
<th>Project Installation</th>
<th>County</th>
<th>Congressional District</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fort A.P. Hill</td>
<td>Caroline</td>
<td>1st</td>
</tr>
<tr>
<td>Fort Pickett</td>
<td>Brunswick, Dinwiddie, Nottoway</td>
<td>4th</td>
</tr>
<tr>
<td>Joint Base Langley-Eustis</td>
<td>York, Newport News</td>
<td>2nd, 3rd</td>
</tr>
<tr>
<td>MCB Quantico</td>
<td>Prince William, Stafford, Fauquier</td>
<td>1st</td>
</tr>
<tr>
<td>NSA Hampton Roads, Northwest Annex</td>
<td>Virginia Beach</td>
<td>2nd</td>
</tr>
<tr>
<td>NSA Oceana</td>
<td>Newport News</td>
<td>2nd</td>
</tr>
<tr>
<td>NSA Dahlgren</td>
<td>King George</td>
<td>1st</td>
</tr>
<tr>
<td>NWS Yorktown</td>
<td>York, James City, Newport News</td>
<td>1st</td>
</tr>
</tbody>
</table>

For all REPI Project Profiles visit: http://www.repi.mil/BufferProjects/ProjectList.aspx

Key REPI Partners
- Albemarle-Chowan Watershed Roundtable
- Albemarle-Pamlico National Estuary Partnership
- Brunswick County
- Camden County
- City of Chesapeake
- City of Hampton
- City of Virginia Beach
- Civil War Trust
- Commonwealth of Virginia
- Currituck County
- Dinwiddie County
- Ever Green
- Fauquier County
- Hampton Roads Planning District Commission
- James City County
- Land Trust of Virginia
- Lunenburg County
- Maryland Agricultural Land Preservation Foundation
- Maryland Department of Natural Resources
- National Park Service
- Northern Neck Land Conservancy
- Northern Virginia Conservation Trust
- Nottoway County
- Prince William Conservation Alliance
- Patuxent Tidewater Land Trust
- Roanoke River Basin Association
- Stafford County
- St. Mary’s County
- State of Delaware
- The Conservation Fund
- The Conservation Management Institute at Virginia Tech University
- The Nature Conservancy
- The Trust for Public Land
- U.S. Fish and Wildlife Service
- Virginia Outdoors Foundation
- Virginia Tech College of Natural Resources
- Ward Burton Wildlife Foundation
- Williamsburg Land Conservancy and Battlefield Trust

Data Sources
- For Economic Impact Information:

- For Federal Spending and personnel Information:


For more information about the REPI Program, visit www.repi.mil
Fort A.P. Hill’s 76,000 acres provide all-purpose, year-round realistic joint and combined arms training, logistics, and support for active and reserve-component units, along with federal and state agencies. As a regional training center in the Washington, D.C. National Capital Region – approximately midway between Richmond and Washington, D.C. – the post specializes in training, maneuver, and live-fire operations. With 31 separate training areas on 44,000 acres of training lands, the maneuver areas provide ample training space.

Through buffer partnering efforts, Fort A.P. Hill is protecting its enhanced mission from incompatible development and noise complaint issues in quickly developing rural Virginia. In particular, conservation nonprofits and the Commonwealth of Virginia have partnered with the installation to preserve significant key buffer land near the installation boundary and high-noise areas. The Fort A.P. Hill partnership is part of a larger Rappahannock River Valley Refuge Partnership that conserves open space, key natural habitats, working farms and forest lands, cultural resources and wetlands.

An innovative use of REPI included leveraging funds identified for mitigating effects on historic properties on-post for the purchase of an easement off-post that contained a national Historic Landmark Native American village site. The Advisory Council on Historic Preservation endorsed the Fort A.P. Hill partnership as an innovative way to combine historic preservation, land conservation, and military readiness support.

**BENEFIT SUMMARY**

**COMMUNITY**
- Supports existing regional planning efforts, including “green corridor” habitat connections for wildlife
- Provides public recreational opportunities
- Provides benefits to area water supply through wetlands preservation

**MILITARY**
- Preserves on-installation live-fire training capacity through the buffering of high-noise areas
- Prevents workarounds that would have otherwise limited training capacity
- Protects capacity for future growth in multi-Service training requirements, including helicopter capability

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
Fort Pickett provides a live-fire and maneuver training site for active
and reserve Army components, as well as the largest block of special
use airspace in Virginia. The post has the highest active component man-days and
the third highest total man-days in the Army National Guard. It is also the leading
National Guard Training Center for the Marine Corps and the ground warfare forces
of the Navy (such as Special Warfare). Because of such heavy use, the post’s ranges
and firing points produce large amounts of noise, dust, and smoke, and require a dark-
night sky for night flight operations.

However, as Fort Pickett’s isolation dissipates and suburban
development steadily closes in, conflicts with the growing population
will increase over such training-related noise, vibrations, and smoke.
To protect its mission, Fort Pickett is partnering with the Ward Burton
Wildlife Foundation—started by NASCAR driver and Daytona 500
winner Ward Burton—to preserve land near and adjacent to its boundary, ranges, and training routes. The Ward Burton
Wildlife Foundation and other partners are acquiring conservation easements and lands in fee to ensure compatibility with these mission capabilities.

In addition to preventing development and protecting Fort Pickett’s training
capabilities, the partnership is also protecting local water resources and riparian zones.
Fort Pickett is an island of ecological importance and this REPI project helps the post
meet its natural and cultural resources management goals. Buffer lands and wildlife
corridors along the post’s boundary preserve the Nottoway River drainage and serve as
habitat for species vital to the local fishing and ecotourism industry.

**BENEFIT SUMMARY**

**COMMUNITY**
- Protects working lands and maintains local character
- Brings together new partners
- Provides recreational opportunities

**MILITARY**
- Preserves live-fire and maneuver training that produces significant noise
- Provides for future mission growth and multi-Service missions

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
Joint Base Langley-Eustis (JBLE) is one of the first and oldest Air Force facilities in the U.S. and was founded on an undeveloped site near easy access to over-water flight areas. The airfield is now located amid the populous cities of Hampton and Newport News, Virginia, where it is an essential part of the local economy. JBLE is home to the headquarters of the Air Combat Command and houses units of the F-22 Raptor fighter jet and the T-38 Talon supersonic jet trainer. Although these units can currently meet their missions, development and obstructions along the base’s western boundary present a continued risk to the safety of aviators and the community.

Recognizing the base’s importance and the need to address its encroachment concerns, the City of Hampton is working tirelessly with JBLE to acquire lands in the runway’s compatible use and safety zones. A key part of this REPI project will be the ability to manage and control tree height on acquired lands, including removal of any obstructions within the base’s approach-departure surface. Securing these parcels will improve JBLE’s airfield operations and benefit local health and safety.

This REPI partnership is a continuation of a close relationship between the base and its local community. Hampton has already acquired numerous parcels of their own accord within JBLE’s safety and noise zones, and the partners are implementing the results of a recent Joint Land Use Study. This effort will also protect sensitive wetlands and allow for improved natural resources management, including addressing bird aircraft strike hazard concerns and their impact to the Air Force mission.

**Benefit Summary**

**Community**
- Supports coordinating with existing regional planning efforts
- Supports implementation of a Joint Land Use Study
- Protects sensitive ecosystems

**Military**
- Preserves live-fire training mission
- Increases operational safety
- Removes existing encroachment within the operational mission area

**Fast Facts Through 30 Sep 2019**
- Acres preserved: 24
- Transactions conducted: 1
- Total funds expended: $349 thousand
- Project status: Initiated

**Key Partners**
- City of Hampton

**Contact**
Public Affairs Office
(757) 764-5701

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
Marine Corps Base (MCB) Quantico, known as the “Crossroads of the Marine Corps,” is where all Marine Corps Officers receive their initial range combat training: first by qualifying in the Officer Candidate School, followed by the Basic School and the Infantry Officers Course. The base supports the only Marine Corps air facility near Washington, D.C. and provides helicopter transport to the President of the United States. MCB Quantico also hosts the FBI Academy and the Drug Enforcement Administration training academy.

Though MCB Quantico’s location near the nation’s capital underscores its importance, being in such a densely populated and growing area also threatens the base with expanding encroachment. Therefore, MCB Quantico partnered with a local conservation organization, the Prince William Conservation Alliance, to protect one of the last remaining swaths of undeveloped land in the fast-growing region.

A preserved farm was added to the Virginia Department of Game and Inland Fisheries network of wildlife management areas, with MCB Quantico receiving a restrictive easement to ensure protection of the installation’s boundary from future development. The Marine Corps also obtained the right to construct and preserve up to 115 acres of wetlands, and to incorporate the wetlands into a mitigation bank—a first for the Marine Corps. The property is now open to the public for fishing, hunting, and educational programs. MCB Quantico and its partners are continuing to work to protect additional lands near training areas at the base’s airfield, further preserving open space and forest land.

**BENEFIT SUMMARY**

**COMMUNITY**
- Brings together new partners
- Protects working lands and water resources
- Provides recreational opportunities

**MILITARY**
- Preserves live-fire training capabilities
- Protects helicopter training and operations that produce significant noise

**KEY PARTNERS**
- Facquier County
- Land Trust of Virginia
- Northern Virginia Conservation Trust
- Prince William Conservation Alliance
- Stafford County
- Virginia Department of Forestry
- Virginia Department of Game and Inland Fisheries

**FAST FACTS THROUGH 30 SEP 2019**

- Acres preserved: **969**
- Transactions conducted: **6**
- Total funds expended: **$5.4 million**
- Project status: **In Progress**

**CONTACT**
Community Plans & Liaison Officer
(703) 784-5323

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
The Navy’s only East Coast master jet base, Naval Air Station (NAS) Oceana is home to F/A-18 squadrons and supports carrier aircraft home-basing, training, and pre-deployment requirements. Its location in Virginia Beach places it ideally near the Navy’s carrier fleet in Norfolk, offshore training ranges, and inland training routes up and down the eastern seaboard. However, much of Virginia Beach and the greater Hampton Roads region are built out, full of residential development that continues to require NAS Oceana to modify flight procedures and operations.

Protecting key remaining open space around the installation’s only major outlying landing field, Naval Auxiliary Landing Field (NALF) Fentress, and the inter-traffic area for flight routes to and from the air station is vital for NAS Oceana’s capabilities. Work by the cities of Virginia Beach and Chesapeake, to acquire easements in high noise areas and safety zones allows carrier landing practice to continue at NALF Fentress. These protected lands, which include working agricultural lands, also add to a “greenbelt” and are important for the regional watershed.

To further enhance the efforts of this project, NAS Oceana has been working with the local governments and the state of Virginia to develop a comprehensive plan for the inter-traffic area. Not only do the partners plan and coordinate easement acquisition but the local governments have also adopted zoning recommendations to sustain mission compatibility.

**BENEFIT SUMMARY**

**COMMUNITY**
- Preserves working lands and local character
- Supports existing regional planning efforts, including the development of a Joint Land Use Study

**MILITARY**
- Protects off-installation maneuver and night flying training capacity that generates significant noise
- Reduces lost training days and the need for workarounds that limit training realism or effectiveness
- Improves operational safety
- Provides for multi-Service missions

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
Naval Support Activity (NSA) Hampton Roads, Northwest Annex’s mission focuses on cryptologic information support to the Navy, Coast Guard, and Department of Homeland Security. Its primary assets include sensitive communications facilities, training ranges, and support facilities, including the Relocatable Over-the-Horizon Radar (ROTHR) system. The ROTHR system’s mission is to detect and monitor drug trafficking aircraft and ships, which is important for the National Drug Control Strategy. It is the only wide area surveillance asset in the Caribbean basin and South America, with the ability to cover more than 10 million square miles north to south from Florida to Bolivia, and east to west from Brazil to the Galapagos Islands.

Located in the greater Norfolk region, NSA Hampton Roads, Northwest Annex is exposed to electromagnetic interference (EMI) that can severely impact ROTHR’s operation. EMI inhibits the system’s ability to process accurate signals by increasing the background “noise” and potentially masking targets that may go undetected. To protect the ROTHR capability, the city of Chesapeake is working with the Navy to purchase restrictive easements for land within EMI restriction zones to prevent development that would produce EMI disturbances.

In addition to protecting the ROTHR system, which cannot be replicated elsewhere to meet the current mission, this REPI project preserves important ecosystems and lands that provide conservation corridors. The land can remain as open space or agriculture, enhancing area watersheds, while the Navy can continue collecting and disseminating tactically significant air and surface tracking data.

**BENEFIT SUMMARY**

**COMMUNITY**
- Supports existing regional planning efforts
- Protects working lands
- Protects habitat for notable species

**MILITARY**
- Reduces electromagnetic interference

**KEY PARTNERS**
- Camden County
- City of Chesapeake
- Currituck County

**FAST FACTS THROUGH 30 SEP 2019**
- Acres preserved: 682
- Transactions conducted: 2
- Total funds expended: $3.9 million
- Project status: In Progress

**CONTACT**
Community Plans & Liaison Officer  
(757) 836-1837

For more information about REPI, please see http://www.repi.mil.
Naval Support Facility (NSF) Dahlgren supports the research, development, test, and evaluation (RDT&E) activities of the Naval Surface Warfare Center Dahlgren Division for large-caliber weapons—including the Electromagnetic Rail Gun—and explosive detonations. NSF Dahlgren is located on the Potomac River 50 miles south of Washington D.C. in Virginia, allowing for use of the Potomac River Test Range, the nation’s largest fully instrumented over-water gun-firing range. Here the Navy fires every type of gun in use and being developed for Navy ships. The sound and shock waves travel up and down the river and impacts residents of Maryland and Virginia alike.

To prevent incompatible development and protect NSF Dahlgren’s RDT&E mission, the Navy is working with a number of partners to preserve land on both banks of the Potomac River and up to several miles inland. In some cases the partner may acquire the land in fee, but in all cases the Navy will acquire restrictive easements. These easements will remove the development rights on agricultural and forested lands.

Much of the land targeted for protection is already adjacent to public lands that cannot be developed. Protecting these private lands helps secure the isolation of NSF Dahlgren’s mission activities, reducing potential complaints related to noise and shock waves. Additionally, this project advances stream protection initiatives and supports goals for preserving habitat and species throughout the Chesapeake Bay ecosystem, while also protecting the viewshed from the adjacent George Washington Birthplace National Monument.

**BENEFIT SUMMARY**

**COMMUNITY**
- Protects working farm lands
- Preserves habitat for threatened, endangered, and at-risk species
- Preserves water quality and protects water supply
- Protects cultural resources

**MILITARY**
- Protects live-fire testing that produces significant amounts of noise and vibration
- Prevents workarounds that would reduce test and training capacity
- Allows for future mission growth

For more information about REPI, please see [http://www.repi.mil](http://www.repi.mil).
Located in the Hampton Roads region of Virginia, Naval Weapons Station Yorktown includes the Special Areas at Cheatham Annex (Jones Pond), Camp Peary, and the New Kent County Relocatable Over the Horizon Radar (ROTHR). The station hosts sensitive training and operations by Naval Special Warfare Command forces that are essential to national security. Jones Pond is pristine with minimal surrounding development, enabling 24-hour training capability and simulation not easily replicated within the Mid-Atlantic region. The location of the ROTH site, roughly 30 miles north, is critical to current drug interdiction operations.

However, surrounding land is designated an Economic Opportunity Zone and the possibility of mixed-use development would negatively impact NWS Yorktown’s missions. Jones Pond offers a unique environment for Special Forces to conduct specialized training, often at night, which is incompatible with most land use development. Buffers will help mitigate noise-sensitive activities, preserve Camp Peary’s isolation, and protect NWS Yorktown’s Explosive Ordnance Disposal Range and ROTH transmission capabilities.

NWS Yorktown is working with its partners to protect its training activities by acquiring restrictive easements on properties that have historic ties to the Civil and Revolutionary Wars, lands within the Chesapeake Bay Watershed, and areas proximate to existing National Park Service lands. The acquisitions will also maintain green corridors and buffer lands that border the Captain John Smith Chesapeake National Historic Trail, while ensuring the long term sustainability of the Navy’s Special Warfare training missions.

**BENEFIT SUMMARY**

<table>
<thead>
<tr>
<th>COMMUNITY</th>
<th>MILITARY</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Preserves working lands and local character</td>
<td>• Reduces lost training days and the need for workarounds that limit training realism or effectiveness</td>
</tr>
<tr>
<td>• Protects cultural resources</td>
<td>• Ensures the ability to conduct training or testing activities that generate noise</td>
</tr>
<tr>
<td>• Supports a green corridor that allows wildlife to travel between habitats</td>
<td>• Protects the ability to perform sensitive special operations training</td>
</tr>
</tbody>
</table>

For more information about REPI, please see http://www.repi.mil.