GO Virginia
Mary Ball Washington Region 6
Economic Growth and Diversification Plan

REVIEW OF REGIONAL PLANS

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I. REGIONAL PLANS CONSIDERED AND COMPARED

A review of existing regional economic development plans within the Mary Ball Washington Region (Region 6) was conducted. The plans that were reviewed and compared include:

- Fredericksburg Region Industry Cluster Study (2013)
- George Washington Region Transportation Opportunities for Regional Economic Growth (2013)
- Fredericksburg Regional Commuter Workforce Skills Study (2016)
- Northern Neck Tourism Plan (2010)
- Middle Peninsula of Virginia Comprehensive Economic Development Strategy (2017)
- Bay Consortium (LWDA XIII) Local Plan 2017-2021
- Fort A.P. Hill Joint Land Use Study (2014)
- Marine Corps Base Quantico Joint Land Use Study (2014)
- Naval Support Facility (NSF) Dahlgren Joint Land Use Study (2015)

II. GEORGE WASHINGTON REGIONAL COUNCIL (PDC 16)

The Fredericksburg Region Alliance (FRA) contracted for the Fredericksburg Region Industry Cluster Study in 2013 to identify clusters that represent high-opportunity economic development targets and areas of focus for local and regional partners. As part of the study several regional focus groups were convened to evaluate the region’s competitiveness with regards to:

- **Labor** - The quality of workforce and community’s capacity to develop, attract, and retain talent to support firm competitiveness;
- **Location** – access to markets, ideas, networks, and expertise provided by the Fredericksburg Region’s geographic location;
- **Cost** – the overall cost of doing business to include land, labor, and other inputs;
and

- **Culture** – the business climate and the region’s quality of life.

Focus group outcomes found that the assets of the region can spur future regional growth but some obstacles have the potential to limit economic development in the region. The report analyzes the industrial clusters in the region and identifies six priority industry clusters that represent significant opportunity for the region (Table 1).

### Table 1: Six Priority industry clusters from largest to smallest cluster in the Fredericksburg Region.

<table>
<thead>
<tr>
<th>Cluster</th>
<th>Description</th>
<th>Total Employment</th>
<th>Average Annual Wage</th>
<th>Job growth over the next ten years</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>PUBLIC ADMINISTRATION</strong></td>
<td><em>Public administration is defined as establishments of federal, state, and local government agencies that administer, oversee, and manage public programs and have executive, legislative or judicial authority over other institutions within a given area.</em></td>
<td>11,741</td>
<td>$87,203</td>
<td>2.3%</td>
</tr>
<tr>
<td><strong>HEALTH AND LIFE SCIENCES</strong></td>
<td><em>Includes general medical and surgical hospitals, physicians offices, other non-patient care, medical equipment and supplies manufacturing and medical and diagnostic laboratories.</em></td>
<td>11,270</td>
<td>$25,706 (low-paying jobs: $25,706)</td>
<td>4%</td>
</tr>
<tr>
<td><strong>FINANCE, INSURANCE, REAL ESTATE</strong></td>
<td><em>Includes depository and non-depository credit intermediation, security brokerage and other financial investment activities, insurance carriers, agencies and brokerages, insurance and employee benefit funds commercial and real estate activities, and consumer and durable goods leasing.</em></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Industry</td>
<td>Total Employment</td>
<td>Annual Average Wage</td>
<td>Job Growth over the Next Ten Years</td>
<td></td>
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<tr>
<td>----------------------------------</td>
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<tr>
<td><strong>BUSINESS SERVICES</strong></td>
<td>6,925</td>
<td>$54,822</td>
<td>3.5%</td>
<td></td>
</tr>
<tr>
<td>Includes accounting, software</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>design consulting, management</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>office services, employment</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>services, security, and</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>commercial equipment report.</td>
<td></td>
<td></td>
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<tr>
<td><strong>INFORMATION AND COMMUNICATIONS</strong></td>
<td>4,811</td>
<td>$73,418</td>
<td>4.2%</td>
<td></td>
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<tr>
<td>Includes computer system design</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>and related services, printing</td>
<td></td>
<td></td>
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<tr>
<td>and publishing, radio and</td>
<td></td>
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<tr>
<td>television broadcasting, and</td>
<td></td>
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<tr>
<td>wired and wireless communication</td>
<td></td>
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<tr>
<td>careers, data processing hosting</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>and related services.</td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td><strong>MANUFACTURING</strong></td>
<td>3,229</td>
<td>$63,949</td>
<td>3.5%</td>
<td></td>
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<tr>
<td>Includes value-added manufacturing</td>
<td></td>
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<td></td>
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<tr>
<td>processes (i.e. sawmills and</td>
<td></td>
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<tr>
<td>other wood products), engineering</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>services, testing laboratories and</td>
<td></td>
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<tr>
<td>raw material extraction (i.e.</td>
<td></td>
<td></td>
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<td></td>
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<tr>
<td>logging and mineral quarrying)</td>
<td></td>
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</tr>
</tbody>
</table>

During the same year the **George Washington Region Transportation Opportunities for Regional Economic Growth Plan** was developed and later updated in 2016. It presents two challenges within the region – (1) presence of a diversified, professional economic base, and (2) a transportation system with constrained mobility and access. Thus, the plan develops regional economic development goals attributable to benefits generated by transportation infrastructure maintenance, operation, and expansion including:

1. Cultivate a diverse economy that attracts new businesses, and supports business retention.

2. Accelerate and enhance access and amenities that service employment, freight and activity centers.
3. Promote tourism as a thriving industry and key driver of regional economic development and quality of life.

4. Revitalize downtown and riverfront areas to create a sense of place and to initiate commercial development.

5. Leverage strategic location and existing transportation assets to promote re-investment and new development.

The plan goes on to use these five goals and how they align with 8 specific transportation projects. The plan also includes a table of projects that have been identified as the most significant planned multimodal investments over the next 30 years. Regardless of the project status within the table all projects are considered significant to the continued growth and diversification of the regional economy.

At the request of the FRA Board of Directors, the Virginia Economic Developers Association through its Cardinal Assistance Program agreed to review the economic development efforts of the Fredericksburg region. The Cardinal Team volunteers to help communities identify approaches to improve economic development. According to the Report of the Cardinal Team Review, “It is likely that due to “forced growth” the Fredericksburg region will become the fourth metro area in eastern Virginia in the next decade joining Northern Virginia, Richmond and Hampton Roads.” This plan recommends expanding economic development services regionally, particularly marketing. The plan also lists 12 recommendations that address marketing, product development, existing business services, communications and tracking progress made in achieving established goals.

A recommendation of the Report of the Cardinal Team Review was the completion of a Fredericksburg Region Commuter Workforce Skills Study. This commuter study, completed in 2016, identifies the characteristics of commuters for potential employers in the Fredericksburg Region. According to study findings the total number of out-commuters within the region is 61,639 with the majority commuting to Prince William County, Fairfax County, and Washington D.C. More than half of all commuters estimate that it takes at least an hour to get to work each way. Commuters also tend to have higher average income than non-commuters at every level of education and more than half work in the six target priority industry clusters identified by the FRA.

III. NORTHERN NECK PLANNING DISTRICT COMMISSION (PDC17)

The Northern Neck has been grounded in the land and water for over 200 years. The economy consists of traditional rural economic drivers such as farming; forestry, seafood and retirement while emerging industries (i.e. tourism and security) bring new growth, development, and wealth to the area. The Northern Neck Comprehensive Economic Development Strategy (NNCEDS) represents the principal planning interests of Virginia’s Northern Neck Region and was developed through the active participation of private-sector representatives, public officials, community leaders, workforce-development board, educational institutions, minority groups, and private
individuals. According to the plan the Northern Neck’s economy has been grounded in agriculture and water-based industries for over 200 years. In recent years, however, the Northern Neck has emerged as a popular vacation and retirement destination, in part because of its natural beauty and accessibility to larger metropolitan regions.

According to the plan’s SWOT analysis, strengths and opportunities commonly cited included:

- The region’s beauty and natural resources (i.e. water-based resources and agricultural-based assets).
- Historical location (i.e. the birth place of George Washington, James Monroe, and Robert E. Lee) provides a value and opportunity.
- Tourism is a natural driver for the regional economy, due to natural and historical assets.
- Proximity to Fredericksburg/D.C. and Norfolk.
- The influx of the newer, more educated ‘come heres’ was recognized as a valuable talent pool that adds value to the community, particularly as part of an entrepreneurial initiative,
- The growth and vitality of local banking sector.
- Rappahannock Community College (RCC) is exploring ways to connect education to economic opportunities.

Weaknesses and Threats identified, included:

- Lack of broadband.
- The capacity of the regional workforce.
- Segmentation of the region’s employment base and their current earnings potential.
- The region has grown resistant to any type of change.
- Lack of leadership across the region, particularly in the business community.
- Lack of broadband, natural gas, and three-phase power infrastructure as well as and spotty cell phone coverage.
- The state of public schools, including both facilities and performance.
- Lack of hotel rooms to accommodate tourists and the inability to handle bus tours.
- The loss of HUB zone status by certain business sectors undermines
opportunities to leverage the geographic advantages of the region.

- Degradation of water quality and oyster beds.
- The community “was not refreshing itself as fast in the past.” This statement reflects concern for declining youth population, and the threat of a slow-down of in-migration of senior citizens.

The Plan reviews current indicators of regional economic characteristics. Based on the data, traditional resource-based industries such as agriculture and fishing experienced a decline while there was moderate growth in the health care and social assistance, and finance and insurance industries between 2007 -2011. Additionally, of the region’s top twenty occupations the plan indicates that over 58.3% of individuals in these jobs are employed in five industry sectors: Retail Trade, Real Estate and Rental and Leasing, Health Care and Social Assistance, Accommodation and Food Services, and Agriculture, Forestry, Fishing, and Hunting.

Tourism, real estate, and fishing currently leverage the benefits of the proximity to abundant shoreline resources. These industries are sensitive and reactive to external market and regulatory conditions and are at risk of ‘boom or bust’ cycles. These traditional industry sectors often do not provide broad-based year-round employment opportunities at sustainable wages for most workers. Unfortunately, these industries alone cannot lead to a sustainable and robust economy. Exploration of new, value-added opportunities in professional, scientific, and technical services, manufacturing, aquaculture and agriculture may provide promising approaches to helping to advance economic diversification.

Finally, this plan establishes Goals, Objectives, Actions and performance measures to improve the regional economy:

**GOAL 1**: Infrastructure that facilitates the expansion of existing business and attracts new, higher-wage industry sectors

**OBJECTIVE A**: Improved telecommunications infrastructure

**OBJECTIVE B**: Improved transportation infrastructure

**GOAL 2**: A workforce equipped with the skills and flexibility needed to succeed in a technology-based economy

**OBJECTIVE A**: Additional education and training programs offered in K-12, post-secondary, and adult education and dual-enrollment programs offered through Rappahannock Community College (RCC) and other institutions and providers

**OBJECTIVE B**: Increased number of students and job seekers mastering workplace-readiness skills

**GOAL 3**: A more business-friendly atmosphere across the Northern Neck
OBJECTIVE A: Development of small-business culture and entrepreneurial spirit

OBJECTIVE B: Establishment of the region as a marine hub for the Mid-Atlantic

GOAL 4: Effective and sustainable use of the region’s natural beauty, cultural amenities, and tourism opportunities

OBJECTIVE A: Encourage local economic activity through branding and marketing

OBJECTIVE B: Development of additional public water-access points

OBJECTIVE C: Develop tourism activities with watermen and farmers

To build off the CEDS Plan, the Northern Neck Chesapeake Bay Regional Partnership developed the Stronger Economies Together (SET) Northern Neck Economic Development Plan 2013-2018. The SET initiative focuses on strengthening the capacity of communities in rural America to work together in developing and implementing an economic development blueprint that strategically builds on the current emerging economic strengths of the region.

Similar to the CEDS plan, the SET plan highlights the region’s natural beauty as its most valued asset. There is a pride in the region and its history and the participants consider the Northern Neck to be a region with abundant assets. However, the plan realized that traditional agriculture, seafood and forestry based economy is in transition and can neither support the existing community nor facilitate future economic growth. The plan reiterates the 4 goal areas for region and again identified the lack of broadband and the capacity of the regional workforce are barriers.

In 2010, the Northern Neck Tourism Commission formally requested assistance from the Virginia Tourism Corporation with developing the Northern Neck Tourism Plan, the region’s first tourism strategic plan. Through discussions and input from stakeholders this plan identified tourism assets existing in the community and targeted customers who could enjoy those assets. The process consisted of analyzing the community’s infrastructure, business gaps that support tourism (strengths, weaknesses, opportunities and threats).

The Tourism Mission Statement for Northern Neck Tourism Commission is to facilitate and promote tourism by capitalizing on the abundant natural, historical, cultural, recreational resources, and increasing lodging and dining opportunities in a way that enhances the local community and visitor experiences. Thus, through this plan the Northern Neck Tourism Commission developed strategies and opportunities to increase economic impact through regional tourism development:

GOAL 1: Create Tourism-Friendly Culture in Northern Neck to enhance the visitor experience to the region

OBJECTIVE 1.1: Educate Businesses and local community their role in Tourism

OBJECTIVE 1.2: Work Force Development

OBJECTIVE 1.3: Education – Local leaders
**GOAL 2:** To improve, enhance, and promote quality of life

- **OBJECTIVE 2.1:** Develop a plan to increase tourism and economic benefit for Northern Neck without losing our small-town charm, open spaces, and values
- **OBJECTIVE 2.2:** Address infrastructure needs to enhance tourism

**GOAL 3:** Create Financial support for Tourism Initiatives

- **OBJECTIVE 3.1:** Secure a dedicated funding source for Northern Neck Tourism Commission and Tourism Development for the Area

**GOAL 4:** Improve Marketing Efforts

- **OBJECTIVE 4.1:** Develop a realistic marketing plan

**GOAL 5:** The Commission will create a cohesive strategy/effort for marketing the Northern Neck as a tourism destination.

- **OBJECTIVE 5.1:** Education of Northern Neck Tourism Commission Contributors
- **OBJECTIVE 5.2:** Create a Central Management Entity for Northern Neck Tourism.

This plan serves as guidance for the Northern Neck Tourism Commission, and the localities within the region to make progress toward the development and promotion of tourism. The Board of Directors of the Northern Neck Tourism Commission provides a leadership role in overseeing implementation of the plan; but acknowledged that future assistance and input from various members of the Northern Neck Tourism Commission, tourism organizations, businesses, civic groups, and other interested citizens, will be critical.

**IV. MIDDLE PENINSULA PLANNING DISTRICT COMMISSION (PDC 18)**

The **Middle Peninsula of Virginia Comprehensive Economic Development Strategy** is a regional economic strategy for the 9 localities within the Middle Peninsula. The plan “is designed to bring together the public and private sector in the creation of an economic roadmap to diversify and strengthen the region’s economic fabric.”

Currently 73% of Middle Peninsula workforce commutes out of the region. The remaining workforce, 12,083 workers, live and work in the Middle Peninsula. 8,690 workers live outside the region and in-commute. Collectively, these 32,308 workers form the daily labor pool of the region. They are the backbone of the Middle Peninsula economy.

The economy of the region has traditionally been based on natural resources such as farming, forestry and fishing. The region has expanded the natural resource economic base to include tourism and aquaculture, though the traditional economic drivers still remain strong. Another part of the economy consists of “growing houses – residential
development”, making the region a bedroom community for Richmond, Hampton Roads and Northern Virginia Metropolitan Areas. Manufacturing exists in a few areas in the Middle Peninsula that have municipal water and sewer. Government employment is the largest employer by industry type with 5,385 of the 22,511 total employment.

According to the SWOT analysis conducted for the CEDS plan, regional opportunities consisted of:

a. Developing the tourism industry;

b. Infrastructure improvements – water, sewer, natural gas and internet – to attract business;

c. Developing a port and rail system to attract manufacturing;

d. RCC work force development to train the local workforce; and

e. Development of industrial clusters.

There was consensus among the CEDS Committee that, for economic development: (a) natural resources are the main strength; (b) the limited infrastructure is the main weakness; (c) Tourism is the main opportunity for creating jobs; and (d) environmental regulations are the main threat to business development.

Regional Innovation Clusters (RICs) are defined as regional centers of related industries that foster innovation to enhance long-term economic growth. RICs are geographic concentrations of firms and industries that do business with each other and have common needs for talent, technology, and infrastructure and can provide resources for next-generation enterprises. Eleven regional innovation clusters in 5 different areas where identified:
The plan outlined the following goals:

**GOAL 1:** Further the goals, objectives and projects in the CEDS document.

**GOAL 2:** Create a positive environment for the growth of industry clusters and natural resource based economy by providing the necessary public infrastructure in the Middle Peninsula.

**GOAL 3:** Offer opportunities for technical training and skill development related to manufacturing, tourism, and natural resource based businesses to create to strong, technically trained workforce in the Middle Peninsula.

**GOAL 4:** Develop a regional identify for the Middle Peninsula that celebrates competitive advantages and connects the communities of the region.

**GOAL 5:** Attract or grow businesses that provide living-wage jobs, don’t harm the environment, and maintain rural identity of the Middle Peninsula.

**GOAL 6:** Recognize the importance of the historic towns and gateways in the Middle Peninsula to the overall economic health of the region and develop strategies to stimulate their revitalization.

The report closes with a table of vital projects to be implemented to improve economic development within the Middle Peninsula Region.
V. Bay Consortium

The Bay Consortium Workforce Development Board collaborated with a wide variety of individuals, businesses and organizations throughout the Commonwealth’s Eastern Region in the development of Bay Consortium (LWWDA XIII) Local Plan 2017 – 2021. The Bay Consortium consists of localities of the Mary Ball Washington Region with the exception of Gloucester County as well as the inclusion of the two Eastern Shore localities. The Bay Consortium promotes effective relationships between the workforce development system, economic development, education, and community partners in order to strategically address the talent needs of local employers in the Local Workforce Area XIII.

The Economic Profile and Workforce Demand and Supply Analysis of Area XIII (BCWDA) consists of data that has been produced by the Virginia Employment Commission (VEC), the U.S. Census Bureau, the Bureau of Labor Statistics, the National Center for Education Statistics, and data housed in LMI and Jobs EQ. The analysis captures trends in the region’s workforce demand and supply.

The Bay Consortium region experienced growth in 19 out of 21 industry sectors between 2011 and 2016. The Agriculture, Forestry, Fishing and Hunting sector lost 276 jobs and the Management of Companies and Enterprises sector that lost 24 jobs. The greatest growth occurred in Public Administration (local, state, and federal government) (2,531 job increase), the Accommodation and Food Service (1,677 job increase), and the Retail Trade (1,538 job increase). The top five sectors in terms of 2016 employment were identified as Retail Trade (23,543 / $26,545 avg. wage), Health Care and Social Assistance (22,551 / $41,147 avg. wage), Accommodation and Food Service (17,278 / $16,240 avg. wage), Educational Services (17,406 / $36,719 avg. wage), and Public Administration (16,743 / $77,679 avg. wage). Only the Public Administration industry sector had a higher average annual wage than the regional average.

The plan presents 10 goals:

- Goal 1: Increase business engagement and deliver value to our customers.
- Goal 2: Achieve measurable skills development in our job seeking customers in the form of workforce credentials that matter to business.
- Goal 3: Fill jobs in “demand occupations” that show promise for long-term growth in industries that are strategic to Virginia’s economy and strengthens Area XIII’s economy.
- Goal 4: Help individuals, including individuals with barriers, gain access to the middle class and demonstrate career progression.
- Goal 5: Ensure that workforce system public investments generate a quality return to Virginia and the customers we serve.
  - Objective: Measure economic impact (ROI study), analyze results, and identify strategies to improve over the baseline.
• Goal 6: Transition from being a “manager” of WIOA funds to a “facilitator” of a flexible proactive and responsive regional workforce investment system.

• Goal 7: Identify and acquire additional resources and implement multi-faceted funding models to enhance our financial and future viability.

• Goal 8: Increase availability of and access to high quality, relevant training programs and services that provide job seekers with skills required by local employers.

• Goal 9: Enhance communication loops between and among all stakeholders.

• Goal 10: Position the BCWDB as the region’s primary catalyst for personal, business, economic, and community prosperity.

Finally, the plan acknowledges that technology will continue to be a common thread in expanding access to workforce services, particularly for individuals with barriers to employment.

VI. Regional Military Bases

Marine Corps Base (MCB) Quantico Joint Land Use Study (JLUS) is a cooperative land use planning initiative between the Marine Corps, Stafford County, Prince William County and Fauquier County, as well as others responsible for planning, development and communications in the region. The plan provides an on-going framework for those local governments and military actions necessary to encourage compatible community growth around MCB Quantico and to improve the quality of life in the surrounding communities.

The study developed 41 recommendations to address compatibility issues that fell into eight categories, including:

• Coordination
• Communication
• Military Operations
• Transportation Systems
• Utility/Municipal Services
• Virginia Legislative Initiatives
• Community Development/Planning
• Environmental/Conservation/Open Space

Eight short-term recommendations were considered critical. (Table 2)

<table>
<thead>
<tr>
<th>Table 2: Priority Recommendations for MCB Quantico JLUS.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recommendations</td>
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<tr>
<td>-----------------</td>
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</table>


<table>
<thead>
<tr>
<th></th>
<th>Organization</th>
<th>Partners</th>
</tr>
</thead>
<tbody>
<tr>
<td>CO.2</td>
<td>Update the Quantico Regional Executive Steering Committee (QRESC) and Quantico Regional Planning Team (QRPT) Charters to formalize joint consultation procedures amount the JLUS partners for the long term</td>
<td>QRESC/QRPT</td>
</tr>
<tr>
<td>CO.3</td>
<td>Establish mutual notification procedures for new development proposals in Military Influence Area Zones 1-4.</td>
<td>JLUS Counties, Town of Quantico</td>
</tr>
<tr>
<td>CM.2</td>
<td>Establish a process to correlate noise complaints and comments with range operations. This should include U.S. Marine Corps (USMC), Federal Bureau of Investigation (FBI), Drug Enforcement Agency (DEA) and other parties using the ordnance and demo ranges.</td>
<td>MCB Quantico</td>
</tr>
<tr>
<td>MO.1</td>
<td>Pursue technical modeling to create official noise contours associated with MCB Quantico range operations. Update the Range Compatible Use Zone (RCUZ) with new data and adjust JLUS Military Influence Area as applicable.</td>
<td>MCB Quantico</td>
</tr>
<tr>
<td>TS.1</td>
<td>Include jurisdictions in review of the Draft Transportation Management Plan (TMP) being prepared by MCB Quantico.</td>
<td>MCB Quantico</td>
</tr>
<tr>
<td>TS.2</td>
<td>Jointly work together to improve traffic conditions at the Route 1 /Fuller Gate intersection through mutually agreed upon road, gate and intersection improvements.</td>
<td>MCB Quantico</td>
</tr>
<tr>
<td>UM.1</td>
<td>Update the utility service agreement between MCB Quantico and Stafford County for shared water and sewer service, including project MCB Quantico and Stafford growth as part of this update.</td>
<td>MCB Quantico</td>
</tr>
</tbody>
</table>
UM.3 Using the QRESC/QRPT structure, develop proposals for public-public partnership service agreements between MCB Quantico and the surrounding counties. In the short-term, MCB Quantico and Stafford County should continue their coordination to share Regional Fire Training Services and pursue the possibility of a cooperative effort to establish a Regional Fire Training facility.

QRESC/QRPT

MCB Quantico, JLUS Counties, Town of Quantico

**Fort A.P. Hill Joint Land Use Study** identifies and evaluates issues of mutual concern for Fort A.P. Hill and the Counties of Caroline, Essex, King George and Spotsylvania and the Towns of Bowling Green and Port Royal. As part of this study mutual concerns/challenges were identified for each county and town and how each county and town wanted to address these concerns.

Those challenges identified included:

- Aircraft Training Routes overlap with some investment priorities
- Aircraft Noise
- Small Arms Noise
- Large Weaponry & Demo Noise
- Vibrations
- Air Pollution
- Water Supply & Quality
- Limited Localized Economic Benefits
- Lack of Permanent Personnel at Fort A.P. Hill
- Attracting Hotel Franchises
- Broadband Infrastructure

- Lost Revenue
- Training on the Rappahannock River
- Oil & Gas Exploration
- Nighttime Operations
In conjunction with the challenges in the region, each locality acknowledged opportunities to remain compatibility with the Fort A.P Hill (Table 3).

<table>
<thead>
<tr>
<th>OPPORTUNITIES</th>
<th>Town of Bowling Green</th>
<th>Town of Port Royal</th>
<th>Caroline County</th>
<th>Essex County</th>
<th>King George County</th>
<th>Spotsylvania County</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Formalized Coordination</strong> - An ongoing implementation body or committee that meets on a regular basis to share information on mission or community land use changes, monitor implementation progress, and revisit longer-term strategies can be an effective mechanism for collaboration.</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
</tr>
<tr>
<td><strong>Town/County and Fort Growth</strong> - Additional business, like restaurants and hotels, offices, and support services would increase the county’s revenue and would provide additional amenities to those living in the area and coming to train – including any future missions.</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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<tr>
<td><strong>Reduce Noise Impacts through Land Use Process</strong> - address noise attenuation, lighting, and/or other measures as part of rezoning applications, subdivision approvals for new development, or subdivision regulations could raise awareness about nearby military operations and help reduce noise impacts on future residents</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
</tr>
<tr>
<td><strong>Reduce Noise Impacts through a Modification of Aircraft operations</strong> - currently unofficial courtesy flight avoidance areas are over the Towns of Bowling Green and Port Royal. An official “no fly” zone over the town would help minimize noise impacts from all (installation and non-installation) aircraft activity on current and future residents</td>
<td>✓</td>
<td>✓</td>
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<tr>
<td><strong>Coordinated Development Reviews – Establish effective procedures for communication</strong></td>
<td>✓</td>
<td>✓</td>
<td></td>
<td></td>
<td>✓</td>
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</table>
OPPORTUNITIES (continued)

Citizen Advocate on Base - *A dedicated citizen advocate at Fort A.P. Hill could provide more efficient responses to citizen complaints related to operations. An advocate could also help citizens navigate legal processes and points of contact internal to the installation.*

Utility Extensions - *Natural gas service would benefit Fort A.P. Hill, the Town of Bowling Green, and would help support development activities in the town and Caroline County. Extension of water along this corridor would provide a reliable source of water for existing developed areas and could provide a redundant water supply for Fort A.P. Hill.*

Contain Noise from Future Missions to inside Installations Boundaries - *Current noise levels at Fort A.P. Hill extend into the surrounding communities. Future noise impacts on the community could be significantly reduced by ensuring that any new noise-generating mission keep all noise impacts and noise contours within the installation boundaries.*

Business Opportunities for local Contractors - *The county would like to see more contracting opportunities for local businesses for maintenance, construction and other services at Fort A.P. Hill.*

Open Communication - *share Board of Supervisors’ meeting agendas with Fort A.P. Hill and welcome ongoing communication efforts by the installation to share information about operations.*

Expanded Broadband - *Providing efficient broadband service to rural parts of the county has proven to be a challenge.*

Reduce Noise Impacts - *Proffered commitments to noise attenuation, real estate disclosures, and/or other measures recommended by Fort A.P. Hill as part of rezoning applications could help mitigate against future noise complaints in the county’s growth area.*

Reduce Noise Impacts through Voluntary Programs -
Voluntary programs to reduce noise impacts in new buildings through sound attenuation and making buyers aware of nearby operations could help reduce future conflicts.

<table>
<thead>
<tr>
<th>Recommendation Summary</th>
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<tbody>
<tr>
<td><strong>COORDINATION</strong></td>
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<tr>
<td>1.1 Execute a MOU to work with JLUS partners to establish the Fort A.P. Hill Executive Steering Committee to discuss community, installation and other compatibility issues on a regular basis.</td>
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<tr>
<td>1.2 Solicit input from Fort A.P. Hill as part of a technical review process on development related submittals and text amendments within the Fort A.P. Hill influence area.</td>
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<tr>
<td>2.1 Issue Fire Warning Orders (through Caroline Alert and other media and social network venues) of training activities that are non-routine and have the potential to be louder than normal, as well as controlled burn activities.</td>
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<tr>
<td>2.2 Improve the process for noise complaint documentation to include internal reporting feature to be shared.</td>
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<td>2.3 Update Fort A.P. Hill’s communication plan to include creative opportunities for residents to observe and understand mission activities.</td>
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<tr>
<td>2.4 Re-structure and expand ICC to include local businesses, residents, installation employees, non-profits, etc., to serve as a citizen group designed to promote positive community and installation relations and to help organize and sponsor events and activities and support economic development.</td>
</tr>
<tr>
<td>2.5 Establish and document a more accountable and timely property claims process, within the Army’s legal reporting limits. Consider establishing an installation contact/liaison person (or expand the PAO’s role) to work with citizens registering complaints to provide information on status and follow-up of any claims registered.</td>
</tr>
<tr>
<td>2.6 Revise the Noise Pamphlet to more accurately describe Fort A.P. Hill air operations and activity and update when necessary due to mission changes.</td>
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</table>

Integration of the Fort A.P. Hill Operational Area in to Planning Policy - already recognized the installation’s operations in its future plans by recognizing and including the installation’s Approach Fans in the county’s Comprehensive Plan.

Develop a Dark Skies Ordinance - Adoption of a county-wide dark skies ordinance would put in place lighting controls and requirements on new development county-wide and would help alleviate the installation’s concerns about increased light pollution.

With an understanding of Fort A.P. Hill’s impact to neighboring communities a set of recommended actions for the installation to strengthen coordination between the localities and the installation were organized in to the following categories:
2.7 Develop an outreach program to educate local citizens and electric utility providers about the impacts of lighting on Fort A.P. Hill operations and include suggestions for voluntary inexpensive approaches to help minimize lighting impacts.

2.8 Update Fort A.P. Hill website to include more information about operations, training, noise impacts and complaint procedures, avoidance areas and key points of contact.

### FORT A.P. HILL OPERATIONS

3.1 Create an official regulation for Fort A.P. Hill aircraft of flight "Avoidance Areas" over populated areas near the Installation.

3.2 Demarcate flight routes through on-the ground markers (to help guide pilots away from avoidance areas).

3.3 Relocate helicopter routes to the interior of the base boundary where it does not conflict with on base training areas.

3.4 Pursue technical modeling to document training air operations to create national or official noise contours associated with Fort A.P. Hill current and future aviation operations. This may require reliance upon assumptions until more accurate data can be collected.

3.5 Establish and implement reporting procedures and requirements to enable the tracking of fixed wing and rotary aircraft operations on an annual basis.

3.6 Provide controlled airspace information and associated altitude restrictions.

3.7 Schedule range activities involving large caliber/high noise-generating weapons to minimize or avoid training prior to noon on Sundays, as feasible.

3.8 Future additional ranges or airfields and new training missions should be sited to minimize and mitigate noise impacts to local jurisdictions and residents.

3.9 Expand upon the Communications Electronics Research, Development and Engineering Center, Night Vision and Electronic Sensors Directorate (CERDEC NVESD) lighting study and publish minimum 'dark sky' requirements for Fort A.P. Hill training operations and work with the communities to incorporate into community lighting ordinances.

### ECONOMIC DEVELOPMENT

4.1 Support Fort A.P. Hill’s pursuit of establishing Washington-Baltimore Northern Virginia General Schedule (GS) pay grades for all personnel stationed at Fort A.P. Hill.

4.2 Using manning/training personnel data from Fort A.P. Hill updated on a bi-annual basis, pursue commercial and retail uses off base that support on base employees and local visitors, tourists and residents.

4.3 Jointly evaluate the benefits and impacts of a new CSX rail spur to support troop and equipment movement and potential mission growth, as well as freight or passenger service benefiting the local communities.

4.4 Ensure proper County business licenses are in place for all construction activity at Fort A.P. Hill through improved oversight and accountability.
5.1 Jointly study the feasibility and potential mechanisms for shared water supply and sewer utility services among the installation, the Town of Port Royal, Town of Bowling Green, and Caroline County.

5.2 Pursue natural gas service to serve Fort A.P. Hill and the Town of Bowling Green/Milford Primary Growth Area.

5.3 Coordinate extension of broadband / telecommunication services to better serve the communities around the installation.

6.1 Pursue an amendment to State Code 15.2-2295 to expand the discretionary application of noise overlay zones, sound attenuation and real estate disclosure to incorporate severity of impacts associated with range noises (not just aircraft noise). The modification should apply to any military installation in Virginia with noise generating operations (not just air facilities or master jet bases).

6.2 Pursue an amendment to the Virginia Construction Code, Section 12, to allow the discretionary application of appropriate noise attenuation standards for impulsive sounds from small arms, large caliber weapons and demolition activity.

**Naval Support Facility Dahlgren Joint Land Use Study** was a collaborative effort between Charles & St. Mary’s County in MD, the Town of Colonial Beach, VA and the Counties of King George and Westmoreland County, VA to establish and encourage a working relationship among military installations and their proximate communities to act as a team to prevent and/or reduce encroachment issues associated with future mission expansion and local growth. The goal of the NSF Dahlgren JLUS was to protect the viability of current and future operations, while simultaneously guiding community growth, sustaining the environmental and economic health of the region and protecting public health, safety, and welfare.

With three main objectives – UNDERSTANDING, COLLABORATION and ACTIONS – this study conducted a compatibility assessment to help establish a balance between community needs and interests with military needs and interests through the comparison of 25 compatibility factors, including air quality, anti-terrorism/force protection, biological resources, climate adaptation, coordination/communication, cultural resources, dust/smoke/steam, energy development, frequency spectrum capacity, frequency spectrum impedance/interference, housing availability, infrastructure extensions, land/air/sea spaces, land use, legislative initiatives, light and glare, water quality/quantity, public trespassing, roadway capacity, safety zones, scarce natural resources, vertical obstructions, and vibration. Of the 25 factors nine were considered irrelevant to the JLUS (i.e. Air Quality, Anti-terrorism/force protection, cultural resources, dust/smoke/steam/frequency spectrum capacity, marine environments, scarce Natural Resources, vertical obstructions, and water quality/quantity). The remaining 16 factors were then the focus of 77 recommended strategies. Figure 1 provides highlights of some of the strategies identified.
Finally, this plan identifies a Military Compatibility Area (MCA) that delineates a geographic area where strategies are recommended to support compatibility planning with JLUS goals and objectives. The Military Compatibility Area Overlay District (MCAOD) is a zoning technique that ensures the JLUS strategies are applied to the appropriate areas, and that locations deemed not subject to a specific compatibility issue are not adversely impacted by regulations or policies inappropriate for their location or circumstance.
VII. Opportunities for Economic Growth – Similarities and Differences

Upon review of regional plans in the Mary Ball Washington Region (Region 6) common themes and differences between the regions presented themselves.

Each planning district commission (PDC) as well as the Bay Consortium listed their largest industry sectors based on employment (Figure 2).

Figure 2: Largest industry sectors by employment.

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<tr>
<th>Bay Consortium</th>
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<tbody>
<tr>
<td>Retail Trade</td>
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<tr>
<td>Health Care and Social Assistance</td>
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<tr>
<td>Accommodation and Food Services</td>
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<tr>
<td>Educational Services</td>
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<tr>
<td>Public Administration</td>
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<tr>
<th>GWRC</th>
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<tbody>
<tr>
<td>Public Administration</td>
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<tr>
<td>Health &amp; Life Science</td>
</tr>
<tr>
<td>Finance, Insurance, Real Estate</td>
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<tr>
<td>Business Services</td>
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<tr>
<td>Information &amp; Communication</td>
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<tr>
<td>Manufacturing</td>
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<tr>
<th>NNPDC</th>
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<tbody>
<tr>
<td>Retail Trade</td>
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<tr>
<td>Real Estate, Rentals &amp; Leasing</td>
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<tr>
<td>Health Care &amp; Social Assistance</td>
</tr>
<tr>
<td>Accommodation and Food Services</td>
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<tr>
<td>Agriculture, Forestry, Fishing, and Hunting</td>
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<th>MPPDC</th>
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<tr>
<td>Government</td>
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<tr>
<td>Retail Trade</td>
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<tr>
<td>Local Government</td>
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<tr>
<td>Health Care &amp; Social Services</td>
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<tr>
<td>Accommodation and Food Services</td>
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Each entity identifies Health Care as a top employer. Also, the MPPDC and the NNPDC share Retail Trade as well as Accommodations and Food Services as a large employer in their region. Public Administration, government employment, is a major employer in all regions.

Beyond these industry sectors the regions identified needs to expand economic development activity including infrastructure development, product development, tourism, workforce development and marketing. While all regions expressed the need for road infrastructure improvement GWRC has dedicated an entire plan to transportation opportunities for the region. The GWRC, in particular, is interested in multi-modal infrastructure that will increase access to the region as well as to nearby metropolitan areas. The NNPDC also mentions that improvements to the transportation infrastructure are critical for the region. The MPPDC on the other hand believes their road system is good, but is underutilized. In addition to transportation infrastructure, broadband infrastructure is also considered essential to expand and improve economic development across the region. Currently, both the MPPDC and NNPDC are working to increase broadband access throughout the region.

Another common theme throughout the regional plans was the potential for tourism expansion. Each PDC is interested in harnessing their region’s natural beauty, rich history, attractive downtowns and access to water to draw tourists into their regions. There’s also interest in maintaining the coastal, small-town community feel and integrating tourism that emphasizes regional historic and natural resource assets. The Northern Neck Tourism Commission developed an entire plan for regional tourism development with specific goals, whereas the Middle Peninsula has recently established the Middle Peninsula Alliance (MPA) and will seek the Virginia Tourism Commission’s assistance in the near future to develop a tourism development plan.

All the plans also address interest in workforce development, retention and the utilization of regional educational resources. In each region, there are educational institutes/programs to provide workforce development and job-ready skill development. To name a few of the institutes there is University of Mary Washington, Rappahannock Community College, and Virginia Institute of Marine Science.

Finally, the plans all mention the need to market economic development resources and services offered within their region. Each discusses this need in varying degrees. GWRC has developed very specific recommendations to address this issue that can be found in the Report of the Cardinal Team.
Review. The MPPDC CEDS plan expresses the need for a marketing plan for tourism as well as overall economic development, but does not provide details. The NNPDC created two goals in their tourism plan to improve marketing and create a cohesive strategy/effort for marketing the Northern Neck as a tourism destination.

When considering the JLUS studies, each military installation is focused on compatibility with neighboring communities. Due to activities that take place at Fort A.P. Hill, Marine Corps Base Quantico, and the Naval Support Facility at Dahlgren there’s a possibility of neighbors being disrupted. Inversely, economic development efforts and community activities may impact installation activities. Therefore, each JLUS provides an overview of potential challenges living in proximity to a military installation and offers opportunities for communities to communicate with the installations and address specific concerns. These plans establish both economic constraints and opportunities for the region.