

8435 Backlick Road Lorton, Virginia 22079 (T) 703-550-8100 (F) 703-550-7897

September 26, 2011

Mr. Steven A. Solomon Director of Finance Prince William County 1 County Complex Court Prince William, Virginia 22192

RE: Public-Private Transportation Act Conceptual Proposal Minnieville Road & Route 1 Improvements

Dear Mr. Solomon:

In accordance with the Prince William County Purchasing Regulations, **Shirley Design/Build, LLC** (Shirley D/B) is pleased to submit this Competing Conceptual PPTA Proposal to design and construct the Minnieville Road and Route 1 Improvement projects. As set forth in the PPTA requirements, we are providing ten (10) copies of the proposal without the Tab 3 confidential information, ten (10) copies of Tab 3 Project Financing, and one CD containing the electronic files.

The Shirley D/B Team is comprised of **Shirley Contracting Company, LLC** and **Dewberry & Davis, LLC**, along with an experienced group of subcontractors and sub consultants, who are prepared to partner with Prince William County to delivery these important transportation improvements to the County as envisioned by the PPTA solicitation. The proposed improvements are consistent with the County's Comprehensive Plan, were included in the County's 2006 Transportation Bond program, and are important improvements to the citizens and businesses of Prince William County.

Through our continuing success on numerous other PPTA and design-build projects, Shirley D/B has developed an excellent track record of successfully managing designbuild projects which enhances our ability to successfully deliver the proposed improvements to Prince William County. Our full-service approach to PPTA and designbuild projects allows design and construction of the projects with a firm fixed price, completes the work on a fast track basis and with a certain date of delivery.

Our Team brings to Prince William County:

- *Experience working together to deliver over \$1 billion of PPTA and designbuild projects* with a proven approach and methodology;
- Prior *PPTA experience working with Prince William County* on the University Boulevard project;
- Proven key personnel and project managers to manage the delivery of the Project Improvements;

- A track record of delivering *quality projects safely and ahead of schedule*;
- *Extensive resources* of one of Virginia's leading road building contractors;
- *Thorough understanding* of the processes and procedures of both Prince William County and the Virginia Department of Transportation; and
- Unmatched design-build experience with proven quality assurance programs and the ability to manage the acquisition of right-of-way, relocation of utilities, coordination with stakeholders, obtain the required permits and clearances to successfully compete the project improvements.

We look forward to the review of our Conceptual Proposal by Prince William County. Should you have any questions regarding the proposal, please contact me at 703-550-3579 or <u>gpalleschi@shirleycontracting.com</u>.

Sincerely,

Garry A. Palleschi Vice President Shirley Design/Build, LLC

I. EXECUTIVE SUMMARY

INTRODUCTION

The Minnieville Road Widening and Improvements to Route 1 Projects (the Projects) are important transportation improvements for the citizens of Prince William County. Initially included in the County's 2006 Road Bond Referendum which was approved by the voters, these Projects are much needed and long overdue. The County has elected to advance these important improvements utilizing the Public Private Transportation Act (PPTA) process which will lead to an expedited design and construction process, delivering the Projects quickly and efficiently.

Delivery of these two important transportation improvement Projects will require a design-build team that can meet the many challenges of these Projects. Critical issues involving design, right-of-way, relocation of public and private utilities, wetland permitting and mitigation, construction, maintenance of traffic and coordination with the public, will require a team with significant experience in each of these areas. The Shirley Design/Build, LLC (Shirley D/B) Team has the demonstrated experience, capabilities, and necessary resources to address all the challenges of these Projects, and we stand ready to partner with Prince William County to deliver these transportation improvements to the County and its citizens.

The Shirley D/B Team, comprised of Shirley Contracting Company, LLC and Dewberry & Davis LLC, is currently involved with three PPTA projects, the Route 28 Corridor Improvements Project, the Spotsylvania County Transportation Improvements Project, and the recently awarded University Boulevard Extension for Prince William County. We have the necessary resources ready and available to immediately undertake the Projects something only local firms can provide.

Our knowledge and understanding of the proposed Projects is significant. We have investigated possible cost saving ideas and have familiarized ourselves with the significant challenges of each of the Projects. We will utilize the lessons learned from our past experiences with PPTA and designbuild projects in Virginia to provide a cost-effective solution and complete the Projects in a minimum amount of time.



OUR APPROACH WILL MINIMIZE THE DAY-TO-DAY BURDEN ON COUNTY STAFF, WHILE ALLOWING THE COUNTY TO FOCUS ITS OVERSIGHT ON KEY ISSUES DURING THE DESIGN, CONSTRUCTION AND ACCEPTANCE OF THE ROADWAY IMPROVEMENTS.

INTEGRATED PROJECT APPROACH

Shirley D/B's project approach is founded on proven PPTA and designbuild experience, common sense analysis, imaginative problem solving and attention to detail. Shirley D/B will manage, and take the risk of, the overall delivery process for the County, including right-of-way acquisitions, utility relocations, designing, permitting, acquiring jurisdictional approvals, and construction of the Project. Our approach will minimize the day-to-day burden on County staff, while allowing the County to focus its oversight on key issues during the design, construction and acceptance of the roadway improvements.

The Project will be managed against a separate master budget and schedule so that potential problems are identified and resolved before they become impediments to the successful conclusion of the Projects. Team members will have responsibility and accountability for specific areas of the work to provide a high level of involvement and understanding of the critical issues within those areas. We will provide Prince William County with quarterly project status reports (or more frequent if desired) that document recent activities and critical issues, and provide a projection of future work along with a financial status of the Projects. We will conduct regular job meetings with Team members, including representatives of Prince William County, to allow for their input and to keep them well informed of the Project's progress. Appropriate County representatives will be notified in advance of any actions needed on behalf of the County in order to facilitate successful completion of the Projects.

BENEFITS OF THE SHIRLEY DESIGN/BUILD APPROACH

Our unique approach presents several benefits to the County

SCHEDULE ADVANTAGES OVER TRADITIONAL DESIGN-BID-BUILD DELIVERY: Our approach provides the County with an expedited and achievable schedule that can deliver the Projects quickly, efficiently, and ahead of the current plan. The County will have the advantage of relying on a single turnkey development entity to be responsible for accomplishing every project activity, including completion of the design, right-of-way acquisition, utility relocation, wetland permitting and mitigation, and construction. Additionally, Shirley D/B will be able to overlap key activities, allowing right-of-way and utility relocation—and in some instances, even some construction activities—to commence before design is complete. TAKES ADVANTAGE OF REDUCED PROJECT COSTS WHILE POSITIONING THE COUNTY FOR ECONOMIC RECOVERY: While these are tough economic times, acting now to construct capital improvements will invest transportation dollars at the best possible time in the design and construction markets, maximizing value to the County taxpayers while creating jobs in the County for engineers, construction workers, suppliers and ancillary businesses. Shirley D/B will look to utilize County based firms to provide subcontracting support and construction material supplies whenever possible as a means of investing County dollars back into firms that work in the County and employ County residents.

PROVENTEAM FOR PROJECT SUCCESS: The Shirley D/B Team is made up of Shirley Contracting Company, LLC, and Dewberry and Davis, LLC. This highly experienced and capable Team has a strong track record of completing public-private and design-build transportation projects, including the Spotsylvania County Transportation Improvements PPTA, the Route 28 Corridor Improvements PPTA project and multiple design-build projects for VDOT. The Team is also currently working with Prince William County on the University Boulevard PPTA project and our intention will be as always-to deliver an outstanding project on an expedited schedule. Our experience working together on a major road projects provides our Team with established practices, procedures, systems, and lessons learned that will jump-start the Projects and bring efficiencies throughout delivery.

SIGNIFICANTLY REDUCES RISK TO THE COUNTY: Shirley D/B will be accountable for the entire schedule and budget, and will manage the design and construction team. With a single entity providing a guaranteed price to accomplish all tasks, the County eliminates its risk of costly unforeseen design and construction issues and project delays. In addition, Shirley D/B will leverage the corporate resources of Shirley and Dewberry for the dayto-day management and oversight responsibility for the Project. This will allow the County to focus only on key "owner" decisions and minimize the administrative time and resource burden on County staff.

The Shirley D/B Team is prepared to discuss and develop our proposal in greater detail with representatives of Prince William County and looks forward to having the opportunity to deliver the Minnieville Road and Route 1 Improvement Projects to the County and its citizens.



🕴 Dewberry

1. QUALIFICATIONS AND EXPERIENCE

1a. Identify the legal structure of the firm, or consortium of firms making the proposal. Identify the organizational structure for the project, the management approach and how each partner and major subcontractor in the structure fits into the overall team.

Legal Structure

Shirley Design/Build, LLC (Shirley D/B), a Virginia limited liability company, proposes to design and construct the Minnieville Road and Route 1 Improvements Projects (the Projects). As the Offeror, Shirley D/B will contract with engineers, consultants, subcontractors, and others, including all team members, to complete the Projects for Prince William County (the County).

Organizational Structure

Shirley D/B has assembled an experienced and highly qualified team to develop, plan, design, and construct the Projects. Each team member has clearly defined roles and responsibilities, as described in Table 1.1, Team Member Roles and Responsibilities, and as shown in Figure 1.1, Organizational Chart. Shirley D/B will serve as the Program and Design-Build Manager, leading the Project. Shirley D/B will contract with Dewberry & Davis LLC (Dewberry) for design and engineering services and Shirley Contracting Company, LLC for construction services. The members of this Team are known for the delivery of major design-build transportation projects in Virginia including the Route 28 Corridor Improvements PPTA Project, the Spotsylvania County Transportation Improvements PPTA Project, the recently awarded University Boulevard Extension and multiple VDOT design-build projects. This experience provides Prince William County a team with an unmatched level of expertise that is in-place and is ready to go to deliver these important transportation improvements.

THE PRIOR PPTA EXPERIENCE OF THIS TEAM PROVIDES PRINCE WILLIAM COUNTY WITH AN UNMATCHED LEVEL OF EXPERTISE THAT IS IN-PLACE AND READY TO GO TO DELIVER THESE IMPORTANT TRANSPORTATION IMPROVEMENTS.

| Firm | Role | Responsibilities | |
|-------------------------------------|-------------------------|---|--|
| SHIDI EV | Program and | Design-Build Manager | |
| DESIGN/BUILD, LLC | Design-Build Manager | Contractual Obligations with Owner | |
| | | Single Point of Contact with Prince William County | |
| | | Program Management | |
| | | Design Management | |
| | | RIGHT-OF-WAY ACQUISITION | |
| | | UTILITY RELOCATION | |
| | | Public Relations Community/Public | |
| SHIRLEY CONTRACTING COMPANY, LLC | LEAD | Construction | |
| | Contractor | QUALITY CONTROL | |
| | Lead Designer | Permitting | |
| Dewberry | | Geotechnical Engineering | |
| | | Traffic Studies and Analysis | |
| | | Design | |
| | | Engineering | |
| | | QA/QC | |

Table 1.1 Team Member Roles and Responsibilities

Additional team members will be added during the Detailed Proposal Phase and thereafter, as needed. In selecting additional team members to deliver the scope of the Project, Shirley D/B will solicit the work of local specialty firms including engineering firms (geotechnical, environmental, utility relocation), roadway subcontractors, and material suppliers. As Shirley D/B adds other team members, we will focus on hiring Prince William County based qualified subcontractors, procure materials from local firms when possible and will include small and disadvantaged business enterprises in the Project. We also anticipate purchasing significant amounts of project materials such as asphalt, concrete and aggregates from firms located within Prince William County. By subcontracting work to County firms and purchasing materials locally, County owned businesses and workers will have an opportunity to participate in the Project.





Management Approach

Our Team members will focus on delivering the Projects in the minimum amount of time possible—and we are committed to partnering with Prince William County, other county agencies and individuals as necessary to successfully develop and execute the Projects. The Project Team will use a fully integrated, multidisciplinary management approach, together with efficient internal and external communications, to successfully manage the Projects. The Project Team members will work in partnership with staff members of Prince William County, the project stakeholders and coordinating agencies as necessary.



Utilizing best practices of design-build projects and experience from successful transportation projects in the region, such as the Route 28 Corridor Improvements Project, Shirley D/B will deliver the Projects in the quickest possible time frame with minimal operational disruption.

Utilizing best practices of design-build projects and experience from successful PPTA projects in the region, the Team will manage the design, acquire right-of-way and relocate utilities in a phased and overlapping process, perform at-risk construction and complete the Projects in the quickest possible time frame. All of the design elements will be carefully reviewed and critiqued by experienced field personnel to ensure a constructible and practical design. Prince William County and the Project Team will participate in reviews at intervals in a multi-staged process to ensure full compliance with the design intent and to facilitate fast-tracking the process. The Project Team will provide the necessary documentation to expedite permits, acquire right-of-way, expedite the relocation of public utilities and document the construction.

To fully achieve the objectives of Prince William County and other stakeholders, Shirley D/B proposes to lead a multi-phased approach that includes Program Management (Right-of-Way Acquisition, Utility Relocation, Permitting, Quality Assurance/Quality Control), Planning, Design, and Construction. Activities for each phase are described in Table 1.2.

| Phase | SHIRLEY D/B PROJECT ACTIVITIES |
|-----------------------|--|
| Program Management | Shirley D/B project leadership will ensure continual focus of all team members and stakeholders on project milestones and ultimate goal achievement. By partnering with Shirley and Dewberry in this process, we will ensure integration of design and construction "best practices" into the planning, design, programming, and construction of the transportation improvements. |
| Planning | Shirley D/B will work with the County and VDOT and other agencies to maximize the value that these Projects will bring to the County and the citizens of Prince William County. The Team will not only devise the optimal design solution for the Projects, but also design the Projects to give Prince William County flexibility to meet future infrastructure needs. |

Table 1.2 Shirley D/B Project Activities by Phase

| Phase | SHIRLEY D/B PROJECT ACTIVITIES | | | |
|--------------|--|--|--|--|
| Design | Shirley D/B will facilitate the design process in order to deliver the most efficient transportation facilities. Additionally, Shirley D/B will work with the Project Design Team to ensure that the ultimate product is in keeping with both the vision of the County as well as the budgetary constraints. An important responsibility of this Team will be integrating design goals with County and VDOT approval parameters, and ensuring that all necessary approvals are obtained. | | | |
| Construction | Shirley D/B will coordinate and manage a team of construction estimators, project managers and superintendents, construction support personnel, engineers, and other corporate resources to meet the construction requirements of the Project. | | | |

Shirley D/B will aggressively manage the project scope and all members of the Team to provide the Best Value to the County. As a large and financially strong team, Shirley D/B will expedite project delivery to complete the Projects ahead of current proposed schedules. We feel that our approach will allow construction of the Projects to begin as soon as possible, allowing the citizens and businesses of Prince William County to benefit from the Projects at the earliest possible date.

SHIRLEY D/B WILL AGGRESSIVELY MANAGE THE PROJECT SCOPE AND ALL MEMBERS OF THE TEAM TO PROVIDE THE BEST VALUE TO THE COUNTY.

Stakeholder Involvement

To complement and facilitate the engagement of key County staff and to support the establishment of consensus we advocate the direct involvement of various stakeholder groups for the duration of project delivery. We will provide Prince William County with quarterly project status reports (or more frequent if desired) that document recent activities and critical issues, and provide a projection of future work along with a financial status of the Projects. We will conduct regular job meetings with Team members, including representatives of Prince William County, to allow for their input and to keep them well informed of the Project's progress. Appropriate County representatives will be notified in advance of any actions needed on behalf of the County in order to facilitate successful completion of the Project. This will enable the delivery of the Projects to move forward in true collaborative partnership among private and public principals and streamline the decision-making process, while facilitating Project Team access to appropriate County representatives. THE SHIRLEY D/B TEAM HAS THE EXPERIENCE AND EXPERTISE TO DELIVER THE PROJECTS ON AN EXPEDITED AND COST-EFFECTIVE BASIS FOR THE COUNTY. WE WILL WORK CLOSELY WITH THE COUNTY BOARD OF SUPERVISORS, COMMUNITY GROUPS, AND OTHER STAKEHOLDERS TO DELIVER THE PROJECTS IN THE MINIMUM AMOUNT OF TIME POSSIBLE.

Summary

The development process of any complex infrastructure project is a collaborative effort between many partners and stakeholders working together to achieve the same goal. The Shirley D/B Team has the experience and expertise to deliver the Projects on an expedited and cost-effective basis for the County. We will work closely with the County Staff, the County Board of Supervisors, community groups, and other stakeholders to deliver outstanding Projects in the minimum amount of time possible. Our Management Approach offers the County the following benefits:

- AVAILABILITY: All Team members are local northern Virginia firms. This local presence allows for prompt response to any concerns, emergencies, and critical task items.
- EFFICIENCY: There is no unnecessary duplication of functions among the companies in the project organization, so operational effectiveness and cost efficiencies are maintained.
- FLEXIBILITY: The Team's working arrangements are flexible, allowing for changes in task and scope of work. All members will have access to required technology and personnel resources. Team members will be added as needed during the development and execution of this program.
- CLEAR RESPONSIBILITY: Our program organization has clear lines of responsibility and authority, avoiding confusion regarding responsibilities for performing work under the contract.
- CORPORATE RESOURCES TO ACCOMMODATE MULTIPLE PROJECT TASKS: Shirley D/B's organizational structure permits the Program Manager to draw upon the strength and diversity of the firms to be involved. The talent, technologies, and assets of the integrated participants will be used to respond to management and technical challenges. The Program Manager has the authority to assign additional personnel to effectively respond to multiple concurrent project tasks.

1b. Describe the experience of the firm or consortium of firms making the proposal, the key principals and project managers involved in the proposed project including experience with projects of comparable size and complexity, including prior experience bringing similar projects to completion on budget and in compliance with design, land use, service and other standards. Describe the length of time in business, business experience, public sector experience and other engagements of the firm or consortium of firms. Include the identity of any firms that will provide design, construction and completion guarantees and warranties and a description of such guarantees and warranties.

INTRODUCTION

The Shirley D/B Team's proven track record and capability of performing all the elements of the Projects from concept to completion, along with an unparalleled level of expertise with the VDOT and PPTA design-build processes, provide Prince William County with certainty of project delivery. This Team will leverage its local knowledge and experience with recent PPTA projects such as the Route 28 Corridor Improvements Project, the Prince William County University Boulevard PPTA project and the Spotsylvania County Transportation Improvements PPTA Project, as well as several recent VDOT design-build projects, to mitigate risk and deliver the Project Improvements in an expedited manner. Following are firm overviews for the key members of the Shirley D/B Team.



Route 28 Corridor Improvements Project for Fairfax and Loudoun Counties was constructed by Shirley and designed by Dewberry. The project converted 10 intersections to grade separated intersection and included secondary road improvements.

FIRM OVERVIEWS

Shirley Design/Build, LLC Program and Design-Build Manager

Shirley Design/Build, LLC (Shirley D/B) will be the Program Manager for the Team. A subsidiary of Shirley Contracting Company, LLC, Shirley D/B provides high-quality, comprehensive design-build services to public transportation and highway authorities and private developers in the Washington, D.C. metropolitan area. Shirley D/B was established in 2005 to focus specifically on the company's design-build capabilities. Shirley D/B offers Prince William County key personnel that have the talent, ability, and resources to perform all of the elements required of the Projects, including management of the right-of-way, relocation of utilities, and obtaining the necessary permits in a concurrent process, on-time and within budget. The Team has extensive design-build experience, unparalleled construction expertise, and proven quality assurance processes and procedures that will ensure the Projects are an unqualified success.





On the \$19 million Pacific Boulevard Design-Build Project, the Team successfully worked with VDOT and an adjacent landowner to design the ultimate turn lanes and intersections to the project, which will avoid future disruptions and reconstruction along the road.

Shirley D/B has been awarded multiple contracts under VDOT's Design-Build Program. In 2007, Shirley D/B, working with Dewberry, began work on the \$25 million Battlefield Parkway Project in Leesburg, Virginia. The Team's experience in dealing with the Northern Virginia Regional Park Authority (NVRPA) and Department of Historic Resources (DHR) helped to accelerate approval of the bridge crossing over the W&OD Trail. The project was completed on schedule and within budget in September 2009. In April 2008, Shirley D/B, working again with Dewberry as the Lead Designer, was awarded a VDOT design-build project for the completion of approximately 0.6 miles of Pacific Boulevard from Severn Way to Autoworld Circle. This \$19 million project features twin bridges carrying Pacific Boulevard over the W&OD Trail, and a 4-lane bridge over Cabin Branch. The Team successfully worked with VDOT and an adjacent landowner to design the ultimate turn lanes and intersections to the project, which will avoid future disruptions and reconstruction along the road. Based on this successful coordination, the vast majority of the right-of-way required for construction will be dedicated at no cost, a savings to VDOT of over \$3 million.

Through their experience on these projects, Shirley D/B offers extensive design management experience, proven quality assurance programs, along with the talent, ability and resources to relocate utilities (or effectively design around them), coordinate with stakeholders, prepare and implement detailed Traffic Management Plans, obtain environmental permits, and manage the acquisition of right-of-way. Above all else, Shirley D/B is able to deliver on these commitments in a concurrent process, on time and on budget.

Shirley Contracting Company, LLC *Lead Contractor*

Regarded as one of the area's largest and most experienced civil general contractors in the area, Shirley Contracting Company, LLC (Shirley) will be the Lead Contractor for the Shirley D/B Team. Founded in 1974 and a subsidiary of Clark Construction, Shirley offers its clients complete services, from preliminary design studies through construction management, construction and closeout. Shirley enjoys an excellent reputation with VDOT, having completed many large-scale highway construction projects for them.

For over 36 years, Shirley has been responsible for many of the area's bridges, highways, railroads, tunnels, retaining & sound walls, roads, trails, and more. Successfully completed projects in the region include multiple sections of the Fairfax County Parkway, multiple sections of the Springfield Interchange, the Woodrow Wilson Bridge Foundation Project, and the Dulles Greenway Capital Improvements Design-Build Project.

Dewberry & Davis LLC

Lead Designer

Dewberry and its affiliated companies are a nationally recognized architecture/engineering (A/E) organization with principal offices in Fairfax, Virginia, and branch offices throughout the Mid-Atlantic and Northeast regions. Since 1956, the firm has offered comprehensive services in architecture, engineering, planning and surveying and currently employs over 1,500 professionals in 21 branch offices. With its combined resources, Dewberry has six offices and more than 400 personnel dedicated to planning, design, and inspection of transportation facilities. These resources have placed Dewberry among *Engineering News-Record's* Top 25 Transportation Engineering firms and one of the nation's leading specialists in infrastructure development.

Dewberry's transportation experience spans a broad range of heavy civil engineering projects, from highways, bridges and transit to airports, railways, and marine structures. Dewberry's presence throughout the major metropolitan areas of the eastern United States offers these regions a high level of proficiency in addressing complex challenges resulting from continued growth, high traffic volume and overworked transportation networks, and aging infrastructure. Dewberry's experience and services have ranged from expansive transportation studies and ITS applications



Dewberry



Dewberry is the Lead Designer on the Route 28 Corridor Improvements with Shirley, pictured above is Route 28 at Route 606 in Loudoun County, Virginia.



Shirley and Dewberry have completed over 8 design-build projects together, representing over \$1 billion of roadway projects including the \$514 million Intercounty Connector Contract C.

to the design and construction administration of some of the largest infrastructure improvement projects in the United States. Their experts in transportation, civil, structural, and hydraulic engineering also have a strong record of successfully completing design-build and privatized projects. Dewberry's presence, expertise, experience and depth of resources is unmatched in heavy highway design-build projects in the Northern Virginia region, including the Dulles Greenway Capital Improvements Project, Pentagon Secure Bypass, the public-private Route 28 Corridor Improvements and Spotsylvania County Transportation Improvements projects.

Dewberry has extensive expertise providing Construction Engineering and Inspection services (CEI) for various state DOT's including Virginia, New Jersey, New York, and Pennsylvania including construction QA/QC services for the original Dulles Greenway project under a design-build approach in the 1990s. Since 1995, Dewberry has provided on-call CEI services for the Northern Virginia District as well as provided construction management and inspection services under VDOT for Phases II through IV of the massive Springfield Interchange Improvements, where Shirley was the Lead Contractor.

Shirley and Dewberry have completed over 8 design-build projects together, representing over \$1 billion of roadway projects including the Intercounty Connector Contract C, Route 28 Corridor Improvements and Spotsylvania County Transportation Improvements, Pacific Boulevard Design-Build Project, and Battlefield Parkway Design-Build Project.



RELEVANT PROJECT EXPERIENCE

As leaders in transportation infrastructure development, design, and construction, the Shirley D/B Team is poised to provide the necessary skills and expertise to support the Minnieville Road and Route 1 Improvements Project. This Team has unparalleled expertise working together, within a PPTA framework, and managing design and construction of transportation projects in the area.

Through their project experience, the members of Shirley D/B have earned the trust of their clients, through commitment to client service and project quality. These prior experiences reduce the overall risk to the County and ensure cooperative efforts among our Team members, the County, VDOT, the community, and other critical project stakeholders. SHIRLEY AND DEWBERRY HAVE COMPLETED MORE DESIGN-BUILD PROJECTS, ACQUIRED MORE RIGHT-OF-WAY AND MOVED MORE UTILITIES THAN ANY OTHER TEAM IN THE AREA.

Experience Working Together

For over eight years, the members of Shirley D/B, Shirley and Dewberry have worked together on over \$1 billion worth of design-build projects and PPTA projects, providing Prince William County with an unmatched level of expertise and experience in the performance of all of the Project's elements. Shirley and Dewberry have completed more design-build projects, acquired more right-of-way and moved more utilities than any other team in the area. In addition to the Team's design-build and PPTA experience, the relationship between Shirley and Dewberry extends back 36 years across multiple traditional design-bid-build projects for VDOT as well as other owners. We have the resources in-house and the Team in place to begin immediately. Having worked closely together for such an extended period of time, we know firsthand each others talents and we understand how to work together. The strength of our Team will ensure the success of the Projects for Prince William County, VDOT and the public.



Dewberry provided Construction Engineering and Inspection services (CEI) for and construction OA/QC services for the original Dulles Greenway project under a design-build approach in the 1990s. Later, Dewberry partnered with Shirley on the Dulles Greenway Capital Improvements Design-Build Project, pictured above.





Shirley and Dewberry are completing the first PPTA project in Northern Virginia for VDOT. The Route 28 Corridor Improvements Project is a \$344 million design-build project to construct ten (10) grade separated interchanges and upgrade several secondary road improvements, including the widening of Centreville Road in Fairfax, Virginia, pictured above.

Public-Private Partnership Experience

Shirley D/B has extensive experience working on projects procured under PPTA legislation, specifically the Route 28 Corridor Improvements Project for VDOT in Loudoun and Fairfax Counties.

Shirley and Dewberry are completing the first Public-Private Transportation Act (PPTA) project in Northern Virginia for VDOT. The Route 28 Corridor Improvements Project is a \$345 million design-build project to construct ten (10) grade separated interchanges and widen and upgrade several secondary road improvements in Fairfax and Loudoun Counties. The initially funded scope of the original five (5) year project included design, right-ofway acquisition, utility relocations, permitting, quality assurance and control, and construction of six (6) grade separated interchanges along Route 28. As a result of the team's successful track record of completing the first phase on-time and on budget, the Team was awarded construction of the four (4) remaining interchanges called for in the overall project scope. The change order issuing the new work was signed in late 2007. All four interchanges are complete and open to traffic.

The Route 28 Corridor Improvements Project has received many accolades and awards, including the 2004 Tower of Dulles Award, presented by the Committee for Dulles in recognition of distinguished service to the Washington Dulles International Airport.

Shirley and Dewberry are also under contract with Spotsylvania County to provide design-build services to upgrade sixteen (16) secondary road projects in the County as part of the Spotsylvania County Transportation Improvements PPTA project, the County's first PPTA project. The projects are the result of a voter approved \$120 million road bond referendum to complete needed road projects as quickly as possible. The County utilized a solicited PPTA process and ultimately selected the Shirley/Dewberry Team to enter into a Comprehensive Agreement to complete the projects.

In February 2011, Shirley D/B with Dewberry as the Lead Designer executed a Comprehensive Agreement with Prince William County to design and construct the University Boulevard PPTA project. Design of the Project's improvements are nearing completion and construction will be underway as soon as possible.

Large-Scale Transportation Experience

Shirley has specialized in heavy highway experience for over 36 years. Dewberry has offered comprehensive transportation engineering services since 1956. Both firms have completed numerous projects for VDOT and other state highway administrations.

In more traditional contracting, Shirley has constructed some signature road and bridge projects. Shirley completed construction of the \$110 million Phase II/III Springfield Interchange Project, ahead of schedule, earning the company a substantial early completion bonus offered by VDOT. In addition to Phases II/III of the project, Shirley completed Phase IV of the interchange reconstruction, a project with a value in excess of \$139 million. This project also earned Shirley an early completion incentive from VDOT. Both projects were part of the rebuilding of one of the busiest interchanges on the east coast with extensive and complex maintenance of traffic plans to accommodate 200,000 plus vehicles per day using the interchange. Shirley also completed the I-66 Widening project in Prince William County for VDOT. Shirley was also recently selected by VDOT to construct the Linton Hall Interchange Project also in Prince William County.



Shirley completed construction of the \$110 million Phase II/III Springfield Interchange Project, designed by Dewberry.

Design-Build Experience

Under VDOT's design-build program, Shirley and Dewberry began work in July 2007 on the \$25 million Battlefield Parkway Project in Leesburg, Virginia. Because the Team was already in place from the PPTA Route 28 Corridor Improvements Project, they were able to implement an aggressive project schedule. They were able to complete the plans, obtain all of the environmental permits, and secure property rights to allow construction to begin, within a year.

In April 2008, Shirley and Dewberry were awarded a second VDOT Design-Build project for the completion of approximately 0.6 miles of Pacific Boulevard from Severn Way to Autoworld Circle. This approximately \$19 million project is yet another demonstration of the depth and versatility of our Team in the design-build field. The main features of this project are twin bridges carrying Pacific Boulevard over the W&OD Trail, and a 4-lane bridge over Cabin Branch. The Team successfully worked with VDOT and an adjacent landowner to add the ultimate turn lanes and intersections to the project, which will avoid future disruptions and reconstruction along the road. Based on this successful coordination, the vast majority of the right-of-



Because the Design-Build Team was already in place, the Shirley/Dewberry team was able to implement an aggressive project schedule on Battlefield Parkway.



The \$19 million Pacific Boulevard project is yet another demonstration of the depth and versatility of our Team in the design-build field. The Team successfully worked with VDOT and an adjacent landowner to add the ultimate turn lanes and intersections to the project, which will avoid future disruptions and reconstruction along the road.



The \$513 million design-build Contract C of the Intercounty Connector calls for the design and construction of a nearly four-mile long, six-lane segment of the ICC from west of US 29 to east of I-95.

way required for construction will be dedicated at no cost, a savings to VDOT of over \$3 million.

Shirley has also been awarded other projects under VDOT's design-build program where Dewberry will serves as the lead designer. These projects include the Waxpool Road Improvements, Pacific Boulevard Widening, Route 50 Widening, and the Route 27/244 Interchange Improvements.

In addition to demonstrated VDOT PPTA and design-build experience, Shirley also has other significant complex design-build experience. In Loudoun County, Shirley, with Dewberry as the Lead Designer, completed the Dulles Greenway Capital Improvement Program for TRIP II, an upgrade to a significant portion of the 14-mile long toll facility. The 3-year, \$71 million design-build project included widening the main line roadway from four (4) to six (6) lanes, widening the Goose Creek Bridges, two new interchanges, and modifications to two (2) interchanges in order to increase capacity of the Greenway by 33%. Shirley implemented a major maintenance of traffic program to ensure that the tolled traffic using the Dulles Greenway was not adversely impacted by daily construction operations. As a demonstration of the success and quality of the project, Shirley and Dewberry received the 2008 Regional Design-Build Excellence Award presented by the Design-Build Institute of America (DBIA).

Currently, Shirley and Dewberry are working together to deliver the Intercounty Connector (ICC) Contract C for the Maryland State Highway Administration (MSHA). The \$513 million design-build contract calls for the design and construction of a nearly four-mile long, six-lane segment of the ICC from west of US 29 to east of I-95. Construction will include two miles of auxiliary lanes and a major interchange at I-95, a new three-level interchange at US 29, twenty-five new bridges, and aesthetic elements to complement the surrounding area. In addition to being responsible for all of the design and construction elements of the project, the Team is responsible for the project's QA/QC implementation and conformance. Due to the length and scope of the Contract C work, 29 communities are impacted by construction operations requiring an integrated Public Outreach Program, which Shirley supports by facilitating effective communication of project information to the various communities and project stakeholders. The project is scheduled to be completed by the end of 2011.

Experience in Prince William County

Shirley and Dewberry have completed various phases of what is one of the largest and most recent transportation projects in Prince William County - the improvements to I-66. In October 1997, Dewberry began working on the design and engineering to widen I-66 to eight lanes between Route 234 Business in Manassas and Route 29 in Gainesville. Additional phases of this work include a new interchange at Route 29 and Linton Hall Road in Gainesville and the creation of a connection between Wellington Road and Route 29 (now known as University Boulevard). In 2006, Shirley began constructing what is the 3rd phase of this project which includes the widening of I-66 from the Route 234 Bypass in Manassas to the I-29 interchange in Gainesville. The project is complete and open to traffic.

Shirley was also recently awarded the Linton Hall Interchange project by the Virginia Department of Transportation. This \$74 million project is the last element of the overall Gainesville Interchange which improves the intersection of I-66, Route 29 and Linton Hall Road.

Dewberry also has extensive experience working directly for Prince William County on a number of projects including:

- University Boulevard and Hornbaker Road designed two separate four and six lane roadways totaling 3,600 L.F.
- Prince William Parkway preliminary and final design of 5 miles of 4 and 6-lane roadway from Old Bridge Road to I-95
- University Boulevard and Wellington Station Road responsible for designing a 5,700 L.F. six lane minor arterial
- Discovery Boulevard @ Innovation Dewberry provided fast-track design services for 3,800 L.F. of four-lane divided roadway and 1,400 L.F. of two-lane roadway
- Spriggs Road Improvement Dewberry provided preliminary and final design services for the construction of a 4.6 mile four lane minor arterial.



Dewberry has extensive experience working for Prince William County on a number of projects including this portion of University Boulevard at Hornbaker Road.

SHIRLEY AND DEWBERRY HAVE COMPLETED VARIOUS PHASES OF WHAT IS ONE OF THE LARGEST AND MOST RECENT TRANSPORTATION PROJECTS IN PRINCE WILLIAM COUNTY - THE IMPROVEMENTS TO I-66. While most other firms must bring in an outside consultant for rightof-way acquisition management, Shirley D/B can provide this service and expertise in-house, eliminating any inefficiencies regarding the rightof-way needs of the Project.

Right-of-Way Acquisition and Management

A critical service that our Team brings to the Project is our in-house capability of managing the acquisition of the right-of-way and easements needed to clear the project for construction. We have a talented core group that has extensive experience in the right-of-way process under a design-build method of project delivery.

While most other firms must bring in an outside consultant for right-of-way acquisition management, Shirley D/B can provide this service and expertise in-house, eliminating any inefficiencies regarding the right-of-way needs of the Project. If the needs of the Project dictate changing the order of acquisitions, having this function in-house allows us to react quickly and maintain the goals and schedule for the Project. It also provides a much greater level of coordination between the design, utility, permitting, and construction disciplines. The Right-of-Way Manager is involved throughout the design stage, providing feedback and recommendations regarding minimizing property impacts, researching proffers, and keeping landowners informed. As the Project progresses through the acquisition phase, the Right-of-Way Manager will manage our prequalified consultants to complete the appraisals, appraisal reviews, title reports, offers, negotiations, certificates, and settlements.

An example of our Team's demonstrated success in the right-of-way acquisition process on a design-build project is the Route 28 Corridor Improvements Project for VDOT. The team has acquired over 200 parcels valued at over \$32.5 million in a time frame to enable completion of \$250 million of the initially funded Contract construction in just 4 ½ years.

Utility Relocation Management

These important design-build projects cannot be successful without effectively managing the utility impacts associated with the work. Shirley D/B is in an excellent position to expedite this work because of our experience and knowledge of the existing utilities and the potential for impacts. Shirley D/B has managed the utility relocations for nearly \$450 million in design-build construction over the last eight years through work on the Route 28 Corridor Improvements, Dulles Greenway Capital Improvements, Battlefield Parkway and Pacific Boulevard Projects. More importantly, relationships with the individual utility owners is a significant strength that our Team brings to the Project. We have cultivated close relationships with the representatives of over 25 public and private utilities, including all of the known utilities located in the two project corridors.

The keys to a successful utility relocation management on the Project will be to have a Team that has performed this function on time and on budget on previous design-build projects and to have a Team in place that has established positive relationships with the utility companies. The Shirley D/B exceeds both of these criteria.

Table 1.3 provided below is a synopsis of Shirley D/B's relevant project experience as it relates to the Project. Datasheets for each of these projects are provided in Attachment 1B.

| Project Name and Location | Firms Worked Together | ₽₽TA Project or Design- Build Project | New Roadway Design and Construction | Widening of Existing Roadways | ROW Acquisition Management | Utility Relocation Management | QA/QC |
|--|-----------------------------|---|--|-------------------------------------|----------------------------------|-------------------------------------|-------|
| University Boulevard Extension PPTA Prince William County, VA | • | • | • | • | • | • | • |
| Spotsylvania County Transportation Improvements Spotsylvania County, VA | • | • | | • | • | • | • |
| Route 28 Corridor Improvements Project <i>Fairfax and Loudoun</i> <i>Counties, VA</i> | • | • | • | • | • | • | • |

SHIRLEY D/B HAS MANAGED THE UTILITY RELOCATIONS FOR NEARLY **\$450** MILLION IN DESIGN-BUILD CONSTRUCTION

| | Firms | PPTA Project or Design- | New Roadway | Widening | ROW | Utility | |
|--|----------|-------------------------------|----------------|-------------|-------------|------------|-------|
| | Worked | Build | Design and | of Existing | Acquisition | Relocation | |
| Project Name and Location | Together | Project | Construction | Roadways | Management | Management | QA/QC |
| Dulles Greenway Capital Improvements Program | • | • | • | • | | | |
| Loudoun County, VA | | | | | | | |
| Intercounty Connector Contract C | | | | | | | |
| Montgomery and Prince George's County, VA | | | | | | | |
| Battlefield Parkway <i>Leesburg, VA</i> | • | • | • | | • | • | • |
| Pacific Boulevard | | | | | | | |
| Loudoun County, VA | • | • | • | | • | • | • |
| I-66 Improvements | | | | | | | |
| Project | • | | • | • | | | |
| Prince William County, VA | | | | | | | |
| Route 7 / 607 Interchange | | | | | | | |
| Loudoun County, VA | - | | | | | • | |
| I-95/I-495/I-395 Springfield Interchange Improvements Phase IV | • | | • | • | | • | • |
| Springfield, Virginia | | | | | | | |
| Spriggs Road | | | | | | | |
| Prince William County, VA | | | | | | | |
| Route 7 / Rivercreek Parkway Interchange | • | | • | | | • | • |
| Leesburg, Virginia | | | | | | | |

KEY PERSONNEL

Shirley D/B has selected a highly qualified team of professionals to deliver the proposed Projects. Comprised of development, design, and construction professionals, this Team has expertise with public-private partnerships and design-build transportation projects, and all proposed key personnel have worked together on past PPTA and design-build projects. This collaborative experience will be integral in ensuring that the development, design and construction process is not only interactive between the surrounding community and other stakeholders, but also results in a much needed infrastructure improvement to the County and its residents. An organization chart depicting the key personnel structure is shown in Figure 1.2.



Shirley is committing many of the same Team members and Key Personnel to the Project that have been responsible for managing more than \$450 million of design-build roadway and bridge projects in Northern Virginia including the Route 28 Corridor Improvements Project, Dulles Greenway Capital Improvements Project, Battlefield Parkway and Pacific Boulevard Design-Build Projects. Further, each of these design-build projects have, or will be, completed ahead of schedule, at a fixed price, and without a single claim or other outstanding issue. Moreover, because our Team members and Key Personnel have worked together on these critical design-build projects for over eight (8) years now, we have developed close working relationships with each other. Having a thorough understanding of each other's abilities allows us to efficiently manage each discipline and reduces project risk.

Resumes for key personnel assigned to the Project including their experience with projects of comparable size and complexity follow this Section in Appendix 1A, Resumes. Table 1.4 provides a brief synopsis of each key personnel's responsibilities and qualifications.

| Name | YEARS OF EXPERIENCE | ROLE AND PROJECT EXPERIENCE |
|---|------------------------|---|
| SHIRLEY DESIGN/BU | JILD, LLC | |
| <i>Jeff Austin, PE</i> Design-Build Project Manager | 18 | As the Design-Build Project Manager for Shirley D/B, Mr. Austin will lead all aspects of the Project and be the single point of contact for the County. Mr. Austin has over 17 years of design and construction experience, including eight years of design and QA/QC management of transportation facilities before joining Shirley Contracting Company, LLC in 2000. With Shirley Contracting, Mr. Austin has been an integral part of the management of several successful projects including on-going design-build and PPTA projects including the Route 28 Corridor Imrovements, Pacific Boulevard, and Battlefield Parkway. Mr. Austin is also the D/B PM on the University Boulevard PPTA project. |
| <i>Todd Kief</i> Utility Relocation Manager | 25 | As Utility Relocation Manager, Mr. Todd Kief will actively coordinate existing and proposed utilities with the Design disciplines, MOT, Safety, and Design-Build Contractors. Mr. Kief has managed the utility relocations for nearly \$450 million in design-build construction in the Northern Virginia Region over the last seven years through his work on the Route 28 Corridor Improvements, Dulles Greenway Capital Improvements, Battlefield Parkway and Pacific Boulevard Design-Build Projects. |

Table 1.4 Key Personnel Responsibilities and Qualifications

| Name | YEARS OF | ROLE AND PROJECT EXPERIENCE |
|--|------------|---|
| | Experience | |
| <i>Jim Ashton</i> Right-of-Way Manager | 36 | Right-of-Way (ROW) Manager, Mr. James Ashton has the responsibility for acquiring the right-of-way and easements needed for Shirley's design-build projects. Mr. Ashton will be involved throughout the design stage, providing feedback and recommendations regarding minimizing property impacts, researching proffers, and keeping landowners informed. He will coordinate between the design, utility, permitting, and construction disciplines. Mr. Ashton has been the ROW Manager on the Route 28 Corridor Improvements Project for VDOT and on both the Battlefield Parkway and Pacific Boulevard Design-Build Projects. Currently Mr. Ashton is managing the right-of-way acquisition on the Spotsylvania County Transportation Improvement PPTA project. |
| SHIRLEY CONTRACT | ING COMPAN | IY, LLC |
| <i>Tony Jefferys</i> Construction Manager | 37 | Reporting to the Design-Build Project Manager, Mr. Jefferys has the responsibility to manage all aspects of project construction. He will facilitate all constructability reviews, work closely with the Utility Manager to plan for necessary relocations, and coordinate with the Right-of-Way Manager to prioritize and schedule the acquisition process will maintain the project schedule, coordinate with the QC Manager, Project Manager, and Superintendent to ensure all construction materials and activities are in accordance with the Design Manager to arrange for design engineer's review of construction activities through the witness and hold points. Mr. Jefferys has specific design-build experience with projects such as the Route 606 Interchange Project and the Dulles Greenway Capital Improvements. |
| <i>Randy Reale</i> Safety Manager | 28 | As Project Safety Manager, Randy Reale is responsible for ensuring that the Project is operating in a safe manner and that employees assigned to the Project have received proper training. Mr. Reale also oversees all efforts to ensure safe travel zones for the traveling public. Mr. Reale has over 35 years project safety experience. Prior to joining Shirley in 2008, Mr. Reale worked as Safety Manager with Kiewit Construction Company writing safety plans for multiple projects; reviewing plans, training supervisors, engineers and all project personnel and developing hazard assessments for projects. Mr. Reale has also served in the role as Safety Manager for Western Summit Constructors, Balfour Beatty, and Archer Western. |
| DEWBERRY & DAVIS | LLC | |
| <i>Jeremy Beck, P.E.</i> Design Manager | 11 | Mr. Jeremy Beck has extensive experience in all areas of highway engineering with emphasis on large-scale, privately funded, multi- disciplined transportation projects in the Washington Metropolitan area. He is responsible for a wide range of tasks including acting as the day-to-day designer for roadway horizontal and vertical alignment, maintenance of traffic, cost estimating, utility relocation coordination, and overall design management. Mr. Beck has experience designing and constructing infrastructure for Spotsylvania County, Loudoun County, VDOT, Prince William County, the Town of Dumfries, and other local entities along with coordinating with government officials and local utility companies and is familiar with state and local criteria and procedures. |

| Name | YEARS OF | ROLE AND PROJECT EXPERIENCE |
|--|------------|--|
| | Experience | |
| <i>G. Shawn Ball, P.E.</i> Quality Control Manager | 21 | As Quality Control Manager, Mr. Shawn Ball is responsible for developing the QA/QC Plan and obtaining VDOT approval of a QA/QC plan specific to the challenges of the Project. Using specific previous experience and significant first hand knowledge of VDOT's requirements for QA/QC on design-build projects for both the development of the Project's QA/QC Plan and its execution in the field, Mr. Ball is uniquely qualified to perform quality assurance management on this Project. Specific project experience includes the Dulles Greenway Capital Improvements Program, where Mr. Ball provided support for the quality control and construction inspection services, and the Route 28 Corridor Improvements Project. |
| <i>Kim Larkin</i> Permitting Manager | 25 | As Permitting Manager, Ms. Larkin, a Senior Regulatory Specialist in Dewberry's Water Resources Engineering Department, will leverage her experience in permitting involving US Army Corps of Engineers, Virginia DEQ, and VMRC and her experience with the National Environmental Policy Act (NEPA). She will offer support with her knowledge of aquatic and wetland ecology and her experience in working with local, state, and federal agencies. Her experience involves extensive coordination with the Federal Highway Administration, US Army Corps of Engineers, the Virginia Department of Environmental Quality, the Virginia Marine Resources Commission, as well as the US Fish and Wildlife Service, the National Marine Fisheries Service, the US Environmental Protection Agency, and other state regulatory agencies. Her coordination with these agencies will ensure the Project is developed in accordance with all applicable federal and state regulations. Ms. Larkin has served in the same role for the Route 28 Corridor Improvements Project, the Dulles Greenway, and the Battlefield Parkway Design-Build Project. |

Safety

Shirley is committed to providing a safe and healthy environment for employees, subcontractors and to the general public who may enter a jobsite or workzone. Shirley considers the prevention of accidents to be an integral part of their operation, and to this end, they have established a comprehensive Corporate Safety Program to assure the continued safety of employees, visitors, and the travelling public. Shirley shall implement and enforce a project specific safety program for the Projects which is designed to:

- Identify and evaluate jobsite hazards;
- Establish methods for correcting unsafe or unhealthful conditions;
- Establish training and retraining programs for employees;
- Develop a system to communicate with our employees, concerning safety matters, and to encourage feedback; and
- Develop an enforcement system to ensure that employees comply with the Safety Program and Policies, including awards to employees for maintaining a safe work environment and disciplinary action for employees not in compliance with the program.

GUARANTIES AND WARRANTIES

Shirley D/B is fully prepared to provide payment and performance bonds to Prince William County for the full value of the construction work to be completed.



Shirley considers the prevention of accidents to be an integral part of our operation, and to this end, they have established a comprehensive Corporate Safety Program to assure the continued safety of all employees on our projects.

1(c) Provide the names, prior experience, addresses, telephone numbers and e-mail addresses of persons within the firm or consortium of firms who will be directly involved in the project or who may be contacted for further information.

Below is the name, address and phone number of the person who may be contacted for further information regarding our proposal:

Mr. Garry A. Palleschi Vice President Shirley Contracting Company, LLC 8435 Backlick Road Lorton, Virginia 22079 phone) 703.550.3579 fax) 703.550.9346 email) garry.palleschi@shirleycontracting.com

Mr. Palleschi has over 21 years of experience in the construction industry and coordinates Shirley's business development, design-build, and publicprivate partnership programs. He helped develop the successful Route 28 Corridor Improvements Project and the Spotsylvania County Transportation Improvements Project, from building the teams and developing the concepts to assisting in the negotiation of the Comprehensive Agreements and Design-Build Contracts.

1(d) Provide a current or most recently audited financial statement of the firm or firms and each partner with an equity interest of twenty percent or greater.

Shirley Design/Build, LLC is a wholly owned subsidiary of Shirley Contracting Company, LLC. Shirley Contracting Company, LLC is providing their most recently audited financial statements in a separately sealed envelope attached to *Section 3, Project Financing*. As a privately held firm, Shirley considers this information to be proprietary and confidential and requests that Prince William County maintain the confidentiality of this information.

1(e) Identify any persons known to the proposer who would be obligated to disqualify themselves from participation in any transaction arising from or in connection to the project pursuant to The Virginia State and Local Government Conflict of Interest Act, Chapter 31 (§ 2.2-3100 et seq.) of Title 2.2.

No members of the Shirley D/B Team has a conflict in accordance with the stated law.

JEFFREY AUSTIN

DESIGN-BUILD PROJECT MANAGER, SHIRLEY DESIGN/BUILD

YEARS OF EXPERIENCE

18 years of design and construction experience

EDUCATION

Virginia Polytechnic Institute & State University, Bachelor of Science, Civil Engineering, 1992

REGISTRATIONS

1999 / Professional Engineer / 0402 033555

RESPONSIBILITIES AND EXPERIENCE

As the Design-Build Project Manager, Mr. Austin will be responsible of all aspects of the design-build team's responsibilities. In addition to being the primary point of contact after award of the Project, Mr. Austin has ultimate responsibility for Contract management, coordination, and integration of the various project disciplines, including design, construction, quality control, right-of-way, utilities, and safety. He will also serve as the primary support to Client efforts to communicate with certain third-party stakeholders, and can take the lead in communicating and coordinating with these third parties if desired by the Client.

Mr. Austin has over 18 years of design and construction experience, including eight years of design and QA/QC management of transportation facilities before joining Shirley Contracting Company, LLC in 2000. With Shirley Contracting, Mr. Austin has been an integral part of the management of several successful projects including on-going design-build projects as listed below.

RELEVANT PROJECT EXPERIENCE

University Boulevard PPTA Project

PRINCE WILLIAM COUNTY, VIRGINIA

Mr. Austin is currently serving as the Design-Build Project Manager for the University Boulevard PPTA project for Prince William County. He is responsible for contract administration and management of the overall design-build process for the \$29 million project to construct University Boulevard between Sudley Manor Drive and Hornbaker Road as a six-lane divided urban roadway. Mr. Austin is also overseeing the upgrading of 7,000 L.F. of Hornbaker road to a four-lane divided roadway. Mr. Austin is the main point of contact with the County, VDOT, permitting agencies and the public on the project.

Pacific Boulevard Design-Build Project

LOUDOUN COUNTY, VIRGINIA

Mr. Austin is responsible for management and direction of the discipline managers for the overall design-build process for this \$19 million designbuild project which extends from Auto World Drive to Severn Way in Loudoun Country, Virginia. Mr. Austin is the main point of contact for the Shirley Design/Build Team and is responsible for communication and coordination with the VDOT, permitting agencies, impacted property owners, and other stakeholders on the project. He developed the CPM schedule and continues to monitor progress on the project, which is scheduled for on-time completion in August 2010. In cooperation with VDOT, Mr. Austin coordinated with Eugenia Investments, the primary property owner impacted by the Project, and the Design Team to prepare exhibits and cost estimates and ultimately revise the Project's design the incorporate improved entrance features for the property. As a result of this partnering





JEFFREY AUSTIN (CONT'D) Design-build project manager, shirley design/build

effort, Eugenia Investments agreed to dedicate the right-of-way at no cost, saving VDOT over \$3 million and facilitating the early start of construction activities

Battlefield Parkway Design-Build Project

Leesburg, Virginia

As the Design-Build Project Manager for the Shirley Design/Build Team, Mr. Austin is responsible for contract administration and management of the overall design-build process for the \$26.5 million design-build project to extend Battlefield Parkway from Kinkaid Boulevard to Route 7 in Leesburg, Virginia. He is also the point of contact for communication and coordination with VDOT, the Town of Leesburg, permitting agencies, impacted property owners, and local communities on the project. Mr. Austin developed the CPM schedule and continues to monitor progress on the project that will be substantially complete in September 2009.

Route 28 Corridor Improvements Project

FAIRFAX AND LOUDOUN COUNTIES, VA

Mr. Austin was Contract Manager responsible for leading Shirley and Dewberry through all phases of the design-build process including design, permitting, ROW acquisition, and utility relocations, and coordinating the design and construction with VDOT. He also coordinated with local land owners, developers, and Fairfax and Loudoun Counties Department of Transportation and Board of Supervisors. Shirley Contracting was awarded a \$26 million change order to design and construct the Centreville Road Widening Project as part of the Route 28 Corridor Improvements Project.

Dulles Greenway Capital Improvements Program

Loudoun, Virginia

Mr. Austin was responsible for overall contract administration for the \$71 million design-build with Dewberry project which included widening the mainline roadway from four to six lanes, expansion of the mainline toll plaza, improvements to the existing Greenway interchange at Route 606, and new interchanges at Routes 653 and Route 654. Mr. Austin was the main point of contact for the communication and coordination with the Owner, VDOT, and other stakeholders on the Project. He developed the CPM schedule and monitored project controls for the duration of the contract to ensure on-time project completion.

Springfield Interchange Phase IV

Springfield, Virginia

Mr. Austin was the Senior Project Manager responsible for management of construction for the \$139 million segment of the Springfield Interchange project. Mr. Austin was responsible for daily coordination and scheduling of the work including material deliveries, equipment, Shirley's crews and subcontractors. Additionally, Mr. Austin had daily communication with VDOT and consultant inspectors from Dewberry for scheduling the work and inspections, submission of shop drawings, RFIs, materials documentation, EEO documentation and payment requests.

TODD M. KIEF utility relocation manager, shirley contracting

YEARS OF EXPERIENCE

24 years of experience

EDUCATION

West Virginia Tech, Bachelor of Science, Civil Engineering

Associate of Science, West Virginia Tech, Civil Survey Tech

RESPONSIBILITIES AND EXPERIENCE

Mr. Kief has over 24 years of experience in utility design, construction and coordination with utilities in heavy civil projects, including utility designation, coordination with utility agencies, right-of-way requirements, and preparation of as-built drawings. Mr. Kief completes all utility relocation and coordination in accordance with the VDOT Right-of-way and Utilities Manual of Instructions while maintaining aggressive design-build schedules. The Utility Relocation Manager plays a vital role in achieving completion of the Project on time and within budget. Reporting to the Design-Build Project Manager, the Utility Manager will actively coordinate existing and proposed utilities with the Design, Right-of-Way, Safety, and Construction Managers and disciplines. He will serve as the liaison with each individual utility company to ensure that utilities are integrated into the Project. Working with the design team, the Utility Manager's first priority is to avoid relocations. If not possible, the focus will be to minimize these relocations to the greatest extent practical. When relocations are unavoidable, he will ensure that they are coordinated with construction and completed within schedule.

As Shirley's Utility Relocation Manager, Mr. Kief has managed the utility relocations for nearly \$450 million in design-build construction in Loudoun and Fairfax Counties over the last seven years through his work on the Route 28 Corridor Improvements, Dulles Greenway Capital Improvements, Battlefield Parkway and Pacific Boulevard Projects. He has also managed all utility relocation on the Spotsylvania Transportation Improvements Project. More importantly, his relationship with individual utility owners will be a significant benefit to the Project. Todd's experience on these design-build projects has enabled him to cultivate close relationships with the representatives of over 25 public and private utilities. Mr. Kief will be tasked with overseeing all aspects of the utility coordination process on the Project.

RELEVANT PROJECT EXPERIENCE

ICC Contract C

MONTGOMERY AND PRINCE GEORGE'S COUNTIES, MARYLAND Mr. Kief's responsibilities include working with the Design and Construction team and all the utility companies (public and private) for the coordination of the relocation of their facilities in conflict with construction. When ever possible, design solutions have been developed to mitigate the impacts to the existing utilities. He developed several solutions on this project that have saved millions of dollars in relocation costs and many months of schedule impact. This \$342 million project includes the development, design and construction of ten interchanges in Northern Virginia to alleviate the traffic concerns of businesses and ten of thousands of commuters dependent on this corridor.



TODD M. KIEF (CONT'D)

UTILITY RELOCATION MANAGER, SHIRLEY CONTRACTING

Route 28 Corridor Improvements

LOUDOUN AND FAIRFAX COUNTIES, VIRGINIA Mr. Kief's responsibilities include working with the Design and Construction team and all the utility companies (public and private) for the coordination of the relocation of their facilities in conflict with construction. When ever possible, design solutions have been developed to mitigate the impacts to the existing utilities. He developed several solutions on this project that have saved millions of dollars in relocation costs and many months of schedule impact. This \$342 million project includes the development, design and construction of ten interchanges in Northern Virginia to alleviate the traffic concerns of businesses and ten of thousands of commuters dependent on this corridor.

Battlefield Parkway Design-Build Project

LEESBURG, VIRGINIA

As Utility Relocation Manager, Mr. Kief is responsible for coordinating with the Northern Virginia Regional Park Authority, Dominion Power, and Verizon to relocate the utilities along the W&OD Trail within an easement on NVRPA property. Mr. Kief is also managing the relocation of aerial utilities along Route 7 and Town of Leesburg water and sewer lines. Mr. Kief performs constructability reviews of the construction plans during the design phase to identify potential utility conflicts and to coordinate the design-build construction documents with the utility owners relocation plans. Mr. Kief manages the construction of the utility relocations and collects field data for utility as-built drawings.

Urbana Water and Sewer Project

Urbana, Maryland

Mr. Kief was responsible for the construction of 5 miles of water and sanitary sewer lines from Fredrick to Urbana, Maryland. The project had one river crossing, seven- stream crossings and attachment of water and sewer lines to one bridge. In addition to the water and sewer network, 2 miles of sanitary sewer siphon system were installed

Route 1 and 301

Richmond, Virginia

Mr. Kief's coordinated the utility work on this \$12 million project for the City of Richmond and the Virginia Department of Transportation. The project consisted of 4,000 LF of new 36" water, 6,000 LF gas; and 2,000 LF of sanitary sewer pipes. This project also included the rebuilding of Route 1, the approach retaining wall and ramp bridges to the new Lee Bridge in downtown Richmond. Mr. Kief was responsible for the coordination with Virginia Power, Richmond Gas, and Richmond Water and Sewer with the demolition of an old Route 1 Bridge and new roadway; monthly reports to VDOT; and the resolutions of all foreseen problems with the utility and roadway.

JAMES ASHTON

RIGHT-OF-WAY MANAGER, SHIRLEY DESIGN/BUILD

YEARS OF EXPERIENCE

35 years of experience

EDUCATION

Northern Virginia Community College, Associates Degree, Real Estate, 1995

RESPONSIBILITIES AND EXPERIENCE

Mr. Ashton has the responsibility for acquiring the right-of-way and easements needed for all of Shirley's design-build projects. Mr. Ashton is an experienced Right-of-Way Acquisition Manager with over 30 years of property acquisition experience in the Northern Virginia area. A member of Shirley since 2004, Jim worked for Fairfax County for more than 26 years, most recently as Director of Right-of-Way Acquisitions. Mr. Ashton will be involved throughout the design stage of the Project, providing feedback and recommendations regarding minimizing property impacts, researching proffers, and keeping landowners informed. As the Project progresses through the acquisition phase, Mr. Ashton will manage our VDOT pregualified consultants to complete the appraisals, appraisal reviews, title reports, offers, negotiations, certificates, and settlements. Mr. Ashton will report to the Design-Build Project Manager. Mr. Ashton will facilitate communication with the affected landowners and will at all times maintain the status of the process for the County and will coordinate closely with the Design, Utility, and Construction disciplines.

Currently he is managing the right of way acquisition process on the Spotsylvania County Transportation Improvements PPTA project for Spotsylvania County Infrastructure LLC (Shirley and English). He is coordinating all aspects of the right-of-way acquisition process, including managing appraisals, obtaining title reports, presenting offers, landowner negotiations, certificate filings, recordations, utility easement instruments, and residential business relocations.

Previously, Mr. Ashton served as the Director of the Land Acquisition for Fairfax County where he supervised a staff of 16 employees involved in land acquisition. His responsibilities included coordinating acquisitions of all real estate and interests acquired on behalf of the Board of Supervisors for the Capital Improvement and Road Bond Programs. Serving as advisor to the Director of Public Works and other agency directors on real estate purchases for the County, testifying in court on real estate acquisition matters involving Fairfax County, and supervising the preparation of condemnation cases. Mr. Ashton was also a Department of Public Works Appraisal and Title Selection Committee member. Mr. Ashton supervised activities of all right-of-way agents and engineering technicians to ensure all tasks were completed in a timely manner. He personally negotiated and settled major and/or sensitive acquisitions for Fairfax County. He was responsible for monitoring activities to ensure County, State, and Federal policies and procedures. He composed legal documents for approval by the Office of the County of Attorney prior to presentation to property owners including condemnation cases, testified in Court on behalf of Board of Supervisors on matters involving real property acquisition and represented the County at public hearings and citizen association meetings.



JAMES ASHTON (CONT'D)

RIGHT-OF-WAY MANAGER, SHIRLEY DESIGN/BUILD

RELEVANT PROJECT EXPERIENCE

Spotsylvania County Transportation Improvements

As Director of Right-of-Way for Shirley Contracting, Mr. Ashton is responsible for the acquisition of all right-of-way and easements needed for the PPTA design-build project which includes nine roadway construction projects and impacts to over 75 parcels.

Route 28 Corridor Improvements PPTA

FAIRFAX AND LOUDOUN COUNTIES, VIRGINIA

Mr. Ashton is responsible for all right-of-way acquisitions required for the project. He manages all phases of the right-of-way acquisition process including appraisals, title reports, offers, landowner negotiations, and certificate filings. Mr. Ashton is also responsible for acquisition of right-of-way for utility easements on the project. Under Jim's leadership our Team has acquired over 200 parcels valued at over \$32.5 million in a time frame that enabled the completion of \$250 million of the initially funded construction contract construction in just 4 ½ years.

Battlefield Parkway Design-Build Project

LEESBURG, VIRGINIA For the \$25 million VDOT design-build project, Mr. Ashton was responsible for acquiring all required right of way and construction easements. He acquired 8 properties valued at \$3.3 million.

Pacific Boulevard Design-Build Project

LOUDOUN COUNTY, VIRGINIA Mr. Ashton is responsible for all right of way acquisition required for the \$20 million design-build project for the Virginia Department of Transportation. For the project he acquired 5 individual properties valued at \$3.7 million.

TONY JEFFERYS

CONSTRUCTION MANAGER, SHIRLEY CONTRACTING COMPANY

YEARS OF EXPERIENCE

37 years of experience

EDUCATION

N/A

REGISTRATIONS

None

RESPONSIBILITIES AND EXPERIENCE

Reporting to the Design-Build Project Manager, this Key Personnel position has the responsibility to manage all aspects of project construction and the Quality Control process. Prior to construction commencing, Mr. Jefferys will facilitate all constructability reviews for each aspect of the design, work closely with the Utility Manager to plan for necessary relocations, and coordinate with the Right-of-Way Manager to prioritize and schedule the acquisition process. During construction, he will be on site at all times, and will maintain the project schedule, coordinate with the QC Manager, Project Manager, and Superintendent to ensure all construction materials and activities are in accordance with the Contract Documents. Additionally, Mr. Jefferys will communicate with the Design Manager to arrange for design engineer's review of construction activities through the witness and hold points.

RELEVANT PROJECT EXPERIENCE

I-95 Widening

FAIRFAX COUNTY, VIRGINIA

Mr. Jefferys is the Project Superintendent on this \$78 million project to widen I-95 from 6 to 8-lanes from the Fairfax County Parkway (Route 7100) to Route 123 at the Prince William County line. Mr. Jefferys was responsible for overseeing all day-to-day field construction activities including coordinating self-perform and subcontracted work, maintaining the CPM schedule, and coordinating with the Virginia Department of Transportation. This 6-mile long project includes widening I-95 to 4-lanes in each direction, bridge widenings including a bridge over the Occoquan River, extensive retaining and noise barrier walls as well as the maintenance of traffic for over 200,000 vehicles per day traveling through the project.

Route 606 Interchange Project

Loudoun County, Virginia

Completed as one of the individual design-build components of the Route 28 Corridor Improvements Project, this new interchange at the intersection of Route 28 and Route 606 in Loudoun County consisted of construction of a relocated detour intersection, eight new loops and ramps, a new bridge overpass, interchange lighting, and signalization. The project included right-of-way acquisitions and major utility relocations of overhead and underground electric, fiber optic and communications, gas, and water. Mr. Jefferys was responsible managing all of the onsite construction activities, maintaining and monitoring the overall project schedule, any managing complex maintenance of traffic on a daily basis. He was also responsible


TONY JEFFERYS (CONT'D) CONSTRUCTION MANAGER, SHIRLEY CONTRACTING COMPANY

for managing the 2-week look ahead and daily activity schedules. His day to day responsibilities included scheduling and coordination of Shirley's self-perform work as well as the work of project subcontractors.

Dulles Greenway Capital Improvements

Leesburg, Virginia

Mr. Jeffery's was the Project Superintendent for this \$75 million designbuild project that included the widening of 14 bridges, construction of over six miles of mainline widening, expansion of the mainline toll plaza, improvements to the existing Greenway interchanges at Route 606 and Route 772, and new interchanges at Routes 653 and Route 654. Mr. Jefferys was responsible for directing all Shirley Contracting's crews and all project subcontractors for all roadway construction activities. Mr. Jefferys monitored the construction activities for compliance with the VDOT standards and specifications as well as the standards of the private owners of the toll road facility. Using a fast-tracked phased design and construction process, the Shirley Team opened the mainline widening of the Greenway six months ahead of schedule.

Remote Delivery Facility-Secure Access Lane

The Pentagon, Arlington, Virginia

Mr. Jeffery's was the Project Superintendent for this design-build project to provide a new secure Access lane to the Pentagon's Remote Delivery Facility including security enhancements at the entrance to the new secure access lane. The project also included modifications to the Virginia Route 27/110 interchange to reduce unauthorized access to the Pentagon's grounds. Mr. Jefferys was responsible for management of all construction forces on site including self-perform and subcontracted work. Mr. Jefferys directed Shirley Contracting's crews in completing excavation, grading, erosion and sediment controls, maintenance of traffic, base stone, and drainage operations on the project while scheduling and managing the work numerous subcontractors to ensure security was maintained at all times and the project was completed on schedule.

RANDY REALE

SAFETY MANAGER, SHIRLEY CONTRACTING COMPANY

YEARS OF EXPERIENCE

28 years of experience

EDUCATION

National Center for Construction Education Research, NCCER

Master Trainer Construction, Master Trainer Safety & Health, University of Florida

University of Florida National Certification for Construction Crane Operator, Crane Trainer

CERTIFICATIONS

Cal OSHA Certified Gas Tester G922-05 Classification B Tunneling; Valid through 15 August 2010

Cal OSHA Certified Safety Representative S673-05 Classification B Tunneling; Valid through 15 August 2010

NCCER

OSHA Construction Outreach Trainer

CCHEST Construction health and

Safety Technician (CHST) C440

Certified Blaster/Underground

OSHA 500 Instructor

Federal Emergency Management Agency, Safety Coordinator, Disaster Assistant Employee

RESPONSIBILITIES AND EXPERIENCE

As Project Safety Manager, Randy Reale is responsible for ensuring that the Project is operating in a safe manner and that employees assigned to the Project have received proper training. Mr. Reale also oversees all efforts to ensure safe travel zones for the traveling public. Mr. Reale has over 35 years project safety experience. Prior to joining Shirley in 2008, Mr. Reale worked as Safety Manager with Kiewit Construction Company writing safety plans for multiple projects; reviewing plans, training supervisors, engineers and all project personnel and developing hazard assessments for projects. Mr. Reale has also served in the role as Safety Manager for Western Summit Constructors, Balfour Beatty, and Archer Western.

RELEVANT PROJECT EXPERIENCE

Mr. Reale is Safety Manager on the following projects for Shirley:

VDOT I-95 4th Lane Widening Project

Adding 4th lane to I-95 north and south bound. Bridge structures, traffic control earthworks, retaining walls, utilities re-located.

New Campus East (NCE) Roadways and Bridges North Loop Road, South Loop Road, West North Loop Road

FORT BELVOIR, VA Add roadways and bridges around NCE and tie in to Fairfax County Pkwy.

Fort Belvoir, Main Post Infrastructure Improvements

FORT BELVOIR, VA Move utilities, build additional lanes into/out of Ft. Belvoir

Washington Headquarters Services (WHS)

ALEXANDRIA, VA Earthworks, utilities, Parking Garage, and Roadway improvements around site.

Marine Base Quantico, Replacement Bridge 15 Bauer Road

QUANTICO, VA Demolition of existing bridge and rebuild of a new bridge. Main through way to Officer Candidate School, and air operations

Bolling Air Force Base

WASHINGTON, DC Housing improvements and traffic control on base.

United States Coast Guard Headquarters

WASHINGTON, DC Earth Works and roadway improvements

RANDY REALE (CONT'D) SAFETY MANAGER, SHIRLEY CONTRACTING COMPANY

Mr. Reale's expereince prior to joining Shirley includes:

Kiewit Construction Company - Underground District Office

Mr. Reale was responsible for writing safety plans for multiple projects; reviewing plans and publishing them to projects. He oversaw training for train supervisors, engineers and project managers. Additionally, Mr. Reale developed and wrote hazard assessments for projects, inspected projects for adherence to safety and health programs, and developed traffic control inspections within district protocols.

Western Summit Constructors

ATLANTA, GEORGIA Mr. Reale managed Safety & Health Training Programs in the South East. As Safety Manager, he worked on Water & Wastewater Treatment Plants primarily where he managed traffic control of work sites within the scope of projects.

Balfour Beatty Construction

ATLANTA, GEORGIA Mr. Reale managed Safety & Health Programs for employees on various MARTA & CSO projects in the Atlanta area where he managed traffic control of work sites within the scope of projects.

Archer Western Constructors

ATLANTA, GEORGIA Managed Safety & Health Programs for Employees on various MARTA projects in the Atlanta area. He manage traffic control on interstates for tunnel and overpass works within scope of project limits.

Moseman Construction

ATLANTA, GEORGIA AND COLLEGE PARK, MARYLAND Managed Safety & Health Programs for Employees on multiple Marta and WMATA projects including the Prince Georges Plaza Tunnel in Washington DC. Additionally, he managed traffic control within the scope of project.

JEREMY BECK, PE

LEAD ROADWAY DESIGN ENGINEER, DEWBERRY

YEARS OF EXPERIENCE

11 years of experience

EDUCATION

The Pennsylvania State University, Bachelor of Science, Civil Engineering, 2002

REGISTRATIONS

Professional Engineer, Virginia, 2009

ESCCC Certification #4366C

Advanced Work Zone Traffic Control Training, VDOT Certification No. 102210780

RESPONSIBILITIES AND EXPERIENCE

Mr. Beck has comprehensive experience in roadway infrastructure development in the Northern Virginia Area. His management and design emphasis has been on large and small scale, publicly and privately funded, multi-disciplined transportation projects. His practice has included performing as the Project Manager and Design Manager on numerous design-build projects as well as design-bid-build development. His experience includes working with Design-Build contractors and representing local government agencies while managing necessary elements of project development to ensure plan approval, the acquisition of permits, and completed construction through local, state, and federal agencies.

His experience also includes creating and coordinating project reports, developing alternatives and concepts based on environmental concerns as well as feasibility and constructability, overseeing all aspects of plan development, directing traffic studies and analysis, conducting constructability reviews, coordinating utility relocation activities, developing cost estimates, coordinating land acquisition activities, and performing quality assurance reviews. Mr. Beck has also been directly involved with public information processes and is familiar with local, state, and federal criteria and procedures.

RELEVANT PROJECT EXPERIENCE

University Boulevard Extension PPTA

PRINCE WILLIAM COUNTY, VA

Design Manager responsible for wide-ranging planning as well as preliminary and final engineering design for several County roadways including a one mile section of new four-lane, divided, urban facility between Sudley Manor Drive and Hornbaker Road as well as the design and provision of the eastbound half-section of University Boulevard between Hornbaker Road and Route 234 Bypass, a six-lane, divided, urban roadway. The project incorporated the final design and approval of approximately 7000 feet necessary for the improvement of Hornbaker Road to a four-lane, divided, urban facility as well as numerous connection roadways. The project required extensive coordination with adjacent land owners, alternative analysis necessary to limit impacts to right-of-way and utilities including a bridge to span significant gas transmission lines, as well as incorporating numerous County directed changes while adhering to the original project schedule.

Spotsylvania County Transportation Improvements PPTA

Spotsylvania County, Virginia

Design Manager in charge of the comprehensive transportation planning and wide-ranging preliminary and final engineering design for numerous roadways throughout Spotsylvania County, Virginia. Specific responsibilities





JEREMY BECK (CONT'D) LEAD ROADWAY DESIGN ENGINEER, DEWBERRY

included ensuring appropriate project design; developing roadway and drainage design, coordinating environmental and stormwater management requirements; coordinating between the Design/Build team, Spotsylvania County, and VDOT; managing sub-consultants, performing utility relocation design and coordination; determining right-of-way requirements; conducting quality assurance reviews; and serving as the project engineer representing Spotsylvania County.

Harbor Station Parkway (Route 234)

PRINCE WILLIAM COUNTY, VA Project Manager responsible for overall project development for a single point urban diamond interchange as well as approximately one mile of a new six-lane, divided, urban parkway including the connection and re-alignment of several side roads. Specific responsibilities included alternative analyses, cost estimating, preparing for and attending public presentations, overall design and development management, overseeing roadway, structural and drainage design, coordinating with land owners, the client, Prince William County, VDOT, FHWA, incorporating traffic analysis, environmental, geotechnical, utility, floodplain, stormwater management and other project elements into the overall design, performing feasibility studies, conducting quality assurance reviews and managing sub-consultants.

Route 7/ River Creek Parkway Interchange

Loudoun County, VA

Project Manager in charge of complete interchange planning along with conceptual and final engineering design for the hybrid diamond interchange. Specific responsibilities included managing all aspects of project design; developing interchange geometry and drainage design; overseeing traffic impact analyses; representing the private developer throughout the projects development and construction; coordinating between homeowners associations, Loudoun County, Town of Leesburg, and VDOT; managing and performing extensive utility relocation design; coordinating environmental and stormwater management requirements; managing sub-consultants; coordinating noise studies and conducting sound wall design; coordinating landscape design; and coordinating with several engineering firms performing site development design work adjacent to the interchange.

Route 28 /Willard Road Interchange

FAIRFAX COUNTY, VA

Project Engineer in charge of final engineering design for a single point urban diamond interchange. Specific responsibilities included coordinating all aspects of project design, developing interchange geometry and performing roadway, drainage and erosion and sediment control design, creating maintenance of traffic plans, overseeing traffic signal and signing and marking plan development, coordinating with structural bridge designers, coordinating environmental, permitting and stormwater management requirements, coordinating and performing extensive utility relocation design and supervising lighting design layout.



G. SHAWN BALL

CONSTRUCTION QUALITY CONTROL MANAGER, DEWBERRY AND DAVIS

YEARS OF EXPERIENCE

23 Years of experience

EDUCATION

Virginia Polytechnic Institute, Bachelor of Science, Civil Engineering, 1988

REGISTRATIONS

Professional Engineer, Virginia, 1993

VDOT Soils and Aggregate Field

Compaction (2015)

VDOT Asphalt Field (2014)

VDOT Slurry Seal (2016)

VDOT Surface treatment (2016)

VDOT Hydraulic Cement Concrete Field (2014)

VDOT Pavement Marking (2014)

VDOT Flagger (2013)

Department of Conservation and Recreation (DCR) Certification for Erosion and Sediment Control Inspection (2014)

Nuclear Gauge Safety Training (2011)

Intermediate Work Zone Traffic Control (2013)

ATSSA Certified Traffic Control Supervisor (2013)

10 Hour OSHA Safety Training

VDOT GRIT (Guardrail Installation) (2014)

IMSA Level I (2013)

IMSA Signal Inspection (2014)

RESPONSIBILITIES AND EXPERIENCE

Mr. Ball is a highly experienced Construction Manager and Senior Engineer with more than 20 years of experience in all aspects of highway and bridge construction, delivering cost effective and quality projects and solutions for VDOT acceptance. His extensive knowledge of Federal, State, and County regulations provides an invaluable resource to the success of the projects. Mr. Ball has tremendous knowledge in traffic signal and roadway lighting construction and, additionally, has extensitive experience in utility relocation and coordination. Mr. Ball has provided direct management as the Construction Manger for over fifteen major grade separated interchanges and highway improvements projects in Northern Virginia in the past five years . He has managed over \$600 million dollars in roadway and interchange construction projects including the construction of over 70 bridges.

RELEVANT PROJECT EXPERIENCE

Dulles Greenway

LOUDOUN COUNTY, VA

Quality Assurance Manager (QAM) and Construction Manager in ensuring that the eight Capital Improvement Projects were built in accordance with the VDOT approved, plans and VDOT Specifications and Standards. These projects included the construction two new interchanges (Route 653 Shreve Mill Road and Route 654 Battlefield Parkway) and the improvement and expansion of two additional interchanges (Route 606 and Route 772). Also included were the widening of 14 bridges and the construction of 6 new bridges. Additional capital projects included the widening of the mainline road east and west of the Goose Creek Bridge. Responsibilities included the maintenance of files on all testing of materials, project documentation, review of inspectors daily reports, coordination and rotation of staff assignments to ensure coverage of key construction operations, coordination of design changes with the contractor and engineer, addressing contractor request for information and ensuring that Virginia Department of Transportation (VDOT) approved plans and specifications were enforced by all his inspectors. These eight capital improvements projects were started in March 2005 (each as a lump sum for the contractor) and were completed on time and on under budget in January 2008. All eight of the improvement projects have been accepted by the owner TRIP II and incorporated into the owners' maintenance program.

Route 28 Corridor Improvements Project

FAIRFAX AND LOUDOUN COUNTIES, VA

Mr. Ball serves as the Construction Manger and Resident Engineer for the Construction of Route 28 in Fairfax and Loudoun Counties. These PPTA 28 projects consisted of the construction of six grade-separated interchanges in Phase I and four interchanges in Phase II along a heavy traveled

G. SHAWN BALL (CONT'D) construction quality control manager, dewberry and davis

highway. Responsibilities included the maintenance of files on all testing of materials, project documentation, review of interchange engineers' daily reports, coordination of staff assignments, coordination of design changes with contractor and the design engineer, addressing contractor request for information, and providing interpretation of Virginia Department of Transportation specifications for the staff as required. Duties also included maintaining as-built plans, assisting the design build partner in investigation of field problems and identifying solutions to Maintenance of Traffic and Utility Relocation issues.

Battlefield Parkway Design/Build

Loudoun County, VA

Mr. Ball serves as the Construction Manager of this first Design/Build Interchange Project advertised by VDOT in Northern Virginia. Construction includes dual 1200-foot long bridges and 0.5 miles of four-lane divided highway and includes two traffic signals. 250 foot 7'x 6' triple box culvert Mr. Ball has ensured full compliance with all the provisions of the VDOT approved QA/QC plan including the VA Work Zone Safety and DCR Erosion and Sediment Control compliance. He ensures that the project is being constructed in accordance with the VDOT approved plans and specifications.

River Creek Parkway Design/Build

LOUDOUN COUNTY, VA

Mr. Ball serves as the Construction Manager for this design/build private developer interchange. Construction of this urban diamond interchange consists of a bridge spanning Route 7, 600' MSE retaining wall and 24" gas main relocation. Other activities include a 72" open cut across Route 7 for a storm drain, two directional jack and bores for waterline installation, and two traffic signals. Mr. Ball has been at the center of solving Maintenance of Traffic issues in this heavily traffic corridor and construction modification of retaining walls and other major construction issues. Mr Ball has ensured that the construction contractor has complied with all approved plans and all VDOT Specifications and Standards. He has also, ensured compliance with the VDOT and Town of Leesburg approved QA/QC plan.

Route I-95/I-66 VDOT Traffic Management System

Deputy Project Manager for the construction inspection services contract with Allied Signal. Responsible for interpretation of project contract, special provisions, plans and specifications including oversight of project inspection staff and management of contract technical activities. Duties include review of contractor construction schedule, review of contractor submissions, and inspection of field installation of equipment, maintain master as-built drawings, and coordinate work with other ongoing VDOT projects.



KIMBERLY V. LARKIN

PERMITTING MANAGER, DEWBERRY

YEARS OF EXPERIENCE

25 years of experience

EDUCATION

BS, Environmental Science, Ferrum College, 1986

CERTIFICATIONS

Certificate -Dept. of Professional and Occupational Regulation Subject matter expertise – Virginia Wetland Delineator Task Analysis Workshop.

Certificate-Federal Highway Administration: NEPA, Project Development & Section 4(f)

Certificate Perennial Stream Field ID Protocol

Certificate Applied Fluvial Geomorphology

REGISTRATIONS

Virginia Association of Wetland Professionals

Northern Virginia Building Industry Association

RESPONSIBILITIES AND EXPERIENCE

As Permitting Manager, Ms. Larkin, a Senior Regulatory Specialist in Dewberry's Water Resources Engineering Department, will leverage her experience in permitting involving US Army Corps of Engineers, Virginia DEQ, and VMRC and her experience with the National Environmental Policy Act (NEPA). She will offer support with her knowledge of aquatic and wetland ecology and her experience in working with local, state, and federal agencies. Her experience involves extensive coordination with the Federal Highway Administration, US Army Corps of Engineers, the Virginia Department of Environmental Quality, the Virginia Marine Resources Commission, as well as the US Fish and Wildlife Service, the National Marine Fisheries Service, the US Environmental Protection Agency, and other state regulatory agencies. Her coordination with these agencies will ensure the Project is developed in accordance with all applicable federal and state regulations. Ms. Larkin has served in the same role for the Route 28 Corridor Improvements Project, the Dulles Greenway, and the Battlefield Parkway Design-Build Project.

RELEVANT PROJECT EXPERIENCE

Route 28 Corridor Improvements Project

FAIRFAX AND LOUDOUN COUNTIES, VA

Permitting Coordinator responsible for the permitting of ten grade-separated interchanges, and multiple roadway widening projects. Conducted wetland delineations, T&E surveys, obtaining all necessary regulatory permitting including Clean Water Act Section 404/401, VMRC subaqueous bed permits and permit compliance. Several crossings involve Section 106 and 6(f) issues that she coordinated the required investigations, mitigation, and findings with the VDHR, and the VDCR, and completed an EA, obtained FONSI from the FAA.

Dulles Greenway Capital Improvements Project

LOUDOUN COUNTY, VA

Permitting Coordinator responsible for permitting of four interchanges and widening of the Dulles Greenway for its entire 14 mile length. Under a design-build method of delivery, Ms. Larkin completed wetland delineation, 404/401, & 402 and VMRC permit applications, obtained permits, ensuring permit compliance. Several crossings involved archaeological studies & Section 106 coordination with the Department of Historic Resources and mitigation measures. Coordinated with the MWAA and the FAA to resolve permitting or NEPA documentation.





KIMBERLY V. LARKIN (CONT'D)

PERMITTING MANAGER, DEWBERRY

Battlefield Parkway Design-Build Project

Leesburg, VA

Permitting Coordinator responsible for obtaining the Clean Water Act Section 404 & 401 permits from the DEQ and the Corps of Engineers as well as a sub-aqueous bed permit from the VMRC for this four (4) lane roadway on new location that crosses the W&OD trail (a 4 & 6(f) and Section 106 resource) and a major tributary. As a member of the Shirley Design/Build Team, Ms. Larkin was responsible for insuring the design and construction compliance with NEPA document, and composing a revised EA for project changes.

University Boulevard Extension PPTA

PRINCE WILLIAM COUNTY, VA

Environmental Manager responsible for overseeing all environmental aspects of the project. This included compiling existing environmental studies, and providing completion of additional studies where necessary. This included wetland delineations, cultural resources surveys and Section 106 consultation with VDHR, and coordination of existing permitted impact areas on the eastbound half-section of University Boulevard between Hornbaker Road and Route 234 Bypass as well as the Hornbaker Road improvements in Innovation.

Spotsylvania County Design/Build (PPTA)

SPOTSYLVANIA COUNTY, VA

Ms. Larkin led a group of environmental scientists to identify regulatory issues associated with several locally administered planned roadway improvements. Environmental areas addressed included wetland delineations, well and septic issues, cultural resources data reviews, and endangered species searches. Four roadway projects have advanced to final design and permitting, one of which required a NEPA document since federal funding was involved. Ms. Larkin is assisting the County through the Locally Administered Project Process with VDOT and is currently obtaining final approvals from FHWA and VDOT for the NEPA document. Another project which made it to final design is currently undergoing wetland permitting with regulatory agencies VDEQ and USACE.

Spriggs Road Improvements

PRINCE WILLIAM COUNTY, VA

As Lead Senior Environmental Specialist with extensive experience in transportation permitting, Ms. Larkin and her team conducted the necessary delineation of waters of the U. S. for the 4.5 mile segment of roadway improvements on Spriggs Road and a 7000' safety improvement of Minnieville Road just east of the Spriggs intersection. She permitted 6 separate waters crossings including the Powells Creek. Due to the complexity of the Powells Creek crossing with a 100 year floodplain, lateral stream alignment and substantial wetlands, her team reviewed 4 alternatives with design engineers and provided the project with a cost effective and successfully permitted project.

UNIVERSITY BOULEVARD EXTENSION PPTA

PRINCE WILLIAM COUNTY, VIRGINIA

As Prince William County's PPTA Design-Build Team, Shirley Design/Build is providing comprehensive preliminary planning as well as final engineering design and coordination services for University Boulevard (new, urban four-lane divided roadway) and Hornbaker Road (two to four lane roadway improvement) as well as numerous connecting roadways. The work consisted of all-inclusive roadway and structural design, utility relocation coordination and design, hydraulic and hyrdologic as well as floodplain and stormwater management studies, comprehensive environmental investigations and permitting, permit monitoring, right-of-way acquisition as well as construction inspection services

The proposed improvements to extend University Boulevard and widen Hornbaker Road provided numerous benefits to Prince William County, VDOT and the Commonwealth of Virginia. Local and regional citizens, businesses and government agencies were provided with an enhanced roadway and pedestrian network in and around Innovation Center's Regional Employment Center as well as the surrounding industrial, flexible employment and residential land uses.

The constructed improvements will reduce congestion and improve safety on adjacent roadways such as Route 234 Bypass, Sudley Manor Drive, Linton Hall Road and Wellington Road thus improving overall Level-of-Service while providing for economic growth. The implementation of the roadways was in accordance with the economic development, transportation and public safety elements of the Strategic Plan for Prince William County and was consistent with the Capital Improvement Program (CIP) and the Comprehensive plan.

CONTRACT AMOUNT \$29 million PROJECTTEAM & ROLES Lead Designer Dewberry Lead Contractor Shirley Contracting Company COMPLETION DATE On-Going OWNER Prince William County



SPOTSYLVANIA COUNTY TRANSPORTATION IMPROVEMENTS

SPOTSYLVANIA COUNTY, VA



CONTRACT AMOUNT \$89.8 million - Phase I and Phase II PROJECTTEAM & ROLES Architect/Engineer Dewberry General Contractor Shirley Contracting Company COMPLETION DATE Phase 1: 2013 OWNER Spotsylvania County

Spotsylvania County Infrastructure, LLC (SCI), a special purpose entity created by Shirley Contracting Company and W.C. English, Inc., with Dewberry as the Lead Design Engineer, is under contract with Spotsylvania County to provide a bundled package of transportation improvements to Spotsylvania County. The projects are part of a solicited PPTA by Spotsylvania County designed to take advantage of a voter approved \$120 million road bond referendum to complete needed road projects as quickly as possible.

SCI was selected by Spotsylvania County through a solicited PPTA to design and construct 9 secondary road projects in the County. The SCI Team executed an Interim Agreement (IA) with the County in September 2006 which included performing preliminary engineering on all 9 projects. The SCI team developed over 40 alternatives for the 9 projects, performing surveys and mapping, development of typical sections and details, roadway plans and profiles, preliminary cross sections, preliminary drainage design, bridge design, wetland delineations & permitting, traffic analysis, right-of-way and utility relocations.

As part of the IA, SCI also provided firm fixed pricing and schedules. In November 2007, the County entered into a Comprehensive Agreement with SCI to complete the design and construction of all 9 projects. The Team was given a Notice to Proceed on 5 of the 9 projects. Completion of the 5 projects range from summer of 2009 to the summer of 2013.



ROUTE 28 CORRIDOR IMPROVEMENTS



CONTRACT AMOUNT \$345 million PROJECTTEAM & ROLES Lead Engineer Dewberry General Contractor Shirley Contracting Company COMPLETION DATE 2011 OWNER VDOT, Northern Virginia District Office

Shirley and Dewberry are completing the first Public-Private Transportation Act (PPTA) project in Northern Virginia for VDOT. The Route 28 Corridor Improvements Project is an approximately \$345 million design-build project to construct 10 grad separated interchanges and widen and upgrade several secondary roads in Fairfax and Loudoun Counties. The initially funded scope of the original five year project included design, right-of-way acquisition, utility relocations, permitting, quality assurance and control, and construction of six grade separated interchanges along Route 28.

These six interchanges were all completed on-time or ahead of schedule between 2003 and 2007. As a result of our successful track record of completing the first phase on time and on budget, the Shirley/Dewberry Team was issued a change order in late 2007 to add funding for the four remaining interchanges called for in the overall project scope. All four interchanges were completed and open to traffic on-time or ahead of schedule in 2009.

Additionally, the Route 28 project scope includes widening Route 28 to eight lanes and construction secondary road improvements on Centreville Road (complete), Davis Drive (complete), and two sections of Pacific Boulevard (complete). Recently, the Route 28 Tax District has authorized funding to allow the Shirley/Dewberry Team to complete conceptual design plans for portions of the Route 28 widening.



ROUTE 28 CORRIDOR IMPROVEMENTS

PAGE 2

The Route 28 project has received many accolades and awards, including the 2004 Tower of Dulles Award, presented by the Committee for Dulles in recognition of distinguished service to the Washington Dulles International Airport.

Awards 2005 Tower of Dulles Award





DULLES GREENWAY CAPITAL IMPROVEMENTS PROGRAM



CONTRACT AMOUNT \$71 million PROJECTTEAM & ROLES Lead Engineer Dewberry Lead Contractor Shirley Contracting Company COMPLETION DATE 2007 OWNER Toll Road Investors Partnership II (TRIP II)

The Dulles Greenway Capital Improvements Program consisted of eight component projects, which were consolidated into a design-build program. This \$71 million program included new interchanges at Route 653 and Route 654, improvements to the existing interchange at Route 606, mainline widening from four to six lanes, expansion of the mainline toll plaza, and widening of the existing dual 660-foot mainline bridges over Goose Creek. All work was required to be performed with no reduction in capacity for the 75,000 vehicles per day utilizing the toll facility. The design-build team of Shirley and Dewberry provided all design, permitting, utility relocations, construction, and construction administration. Additionally, Dewberry completed the QA/QC inspections under a separate contract with TRIP II.

Design of the project included separate submissions of the roadway and bridge plans for each component project. In all, VDOT approved 18 separate plan submissions consisting of eight roadway/interchange plan sets and ten sets of bridge plans. Our Team also completed all environmental permitting for the projects including submission and approval of seven Joint Permit Applications to DEQ, USACE, and VMRC, as well as VSMP permit applications to DCR.

Based on the Team's performance through the first 18 months of the threeyear project, Trip II awarded Shirley a change order to design and construct improvements to the Greenway / Route 772 Interchange including widening the existing bridge over the Greenway from two to six lanes. Our Design/ Build Team completed the design, permitting, and construction of this additional interchange on-time, in less than 18 months.



INTERCOUNTY CONNECTOR (ICC) CONTRACT C

MONTGOMERY AND PRINCE GEORGE'S COUNTIES, MARYLAND



Led by Shirley Contracting Company, LLC, as the Lead Contractor and Dewberry as the Lead Designer, ICC Constructors (IC3), A Joint Venture was selected in January of 2008 as the design-build team for Contract C of the Intercounty Connector (ICC). The \$513 million Contract C includes approximately four miles of the ICC from west of US 29 to east of I-95, approximately two miles of collector-distributor roadway along I-95, and complex interchanges at I-95 and US 29. This contract is the second of five that will create the 18.8-mile ICC, which will connect the I-270/I-370 corridor in Montgomery County to the I-95/US-1 corridor in Prince George's County.

The scope of Contract C includes 3.8 miles of new six-lane roadway, a three level interchange with US 29, a new interchange with Briggs Chaney Road and a new three level interchange with I-95. There are 25 new bridges, with aesthetic elements to complement the surrounding area, more than two miles of sound barriers that will be erected along the roadway, and over two million cubic yards of earthwork. A new bridge that will take Old Columbia Pike over the ICC is expected to be opened to the public in fall 2009. The remainder of Contract C, as well as other portions of the ICC east of Georgia Avenue in Montgomery County, is scheduled to open in late 2011. This aggressive schedule is possible due to the early activities completed by the Team, including field investigation of site conditions, geotechnical investigations of soil conditions, engineering survey work, and field investigation and relocation of utilities.

CONTRACT AMOUNT \$513 million

PROJECTTEAM & ROLES

Lead Engineer Dewberry

Design-Build Manager Shirley Contracting Company

Lead Contractor Shirley Contracting Company

COMPLETION DATE

2011 OWNER

Maryland State Highway Administration

INTERCOUNTY CONNECTOR (ICC) CONTRACT C

The IC3 team is responsible for bridge and structure design and construction, environmental services, floodplain and stormwater management, multiple jurisdiction involvement, and maintenance of traffic on I-95 and US 29. Additionally, the Team is responsible for the Project's QA/ QC implementation and conformance. A specific project QC Program has been approved and is being implemented.

There is a significant commitment from the Project Team to limit environmental impacts to the surrounding communities and area, which includes Little Branch Stream Valley Park and Fairland Regional Park. An Environmental Compliance Plan, which is implemented and managed by the IC3 team, ensures that impacts to forest, cultural resources, parklands, wildlife, wetlands and waterways are minimized







BATTLEFIELD PARKWAY DESIGN-BUILD PROJECT



The Shirley Design/Build, LLC Team, including Shirley Contracting Company, LLC as the Lead Contractor, and Dewberry as the Lead Designer, was selected by VDOT in May 2007 using VDOT's design-build procurement process to design and construct 0.7 miles of 4-lane roadway from Kincaid Boulevard to Route 7. The \$26.5 million project includes dual 1,250 foot bridges spanning the Washington and Old Dominion (W&OD) trail and the Tuscarora Creek floodplain, a 260 foot extension of a triple barrel box culvert, mechanically stabilized earth walls, two signals, roadway lighting, and a structure mounted sound barrier. The design-build team's responsibilities include all design and engineering, permitting, right-of-way acquisition, utility relocations, construction, and quality assurance and quality control. The project requires close coordination with the Northern Virginia Regional Park Authority (NVRPA) to reduce the impacts to the W&OD Trail, a historic pedestrian and equestrian path located within the old W&OD Railroad rightof-way.

The Town of Leesburg has responsibility to take over maintenance of the roadway and bridges once the project was completed . The design-build team coordinated closely with the Town for review and approval of the design, inspection of construction elements, and relocation of the Town owned utilities.

The Shirley D/B Team implemented an aggressive project schedule resulting in early plan approval. This early approval facilitated obtaining the required environmental permits early, allowed early right-of-way acquisition through right-of-entry agreements with adjacent landowners, and allowed construction to begin three months ahead of schedule. The project was completed in the Fall of 2009. **CONTRACT AMOUNT** \$26.5 million

PROJECTTEAM & ROLES

Lead Engineer Dewberry

Design-Build Manager Shirley Contracting Company

Lead Contractor Shirley Contracting Company

COMPLETION DATE September 2009

OWNER VDOT, Northern Virginia District Office

PACIFIC BOULEVARD DESIGN-BUILD PROJECT



Pacific Boulevard is a key component of Loudoun County's transportation plan for the Route 28 parallel road network providing alternate north-south access for local traffic along the west side of Route 28 between Route 606 and Russell Branch Parkway. Although many segments of Pacific Boulevard are currently incomplete, the parallel road network will ultimately provide improved local connectivity and reduce traffic on Route 28.

In April 2008, Shirley Design/Build, LLC with Dewberry as the Lead Designer, and Shirley Contracting as the Lead Contractor, was awarded the \$19 million VDOT design-build project for the completion of a critical segment of this road network between Auto World Circle and Severn Way and to provide alternate access to the businesses located between Route 625 and the W&OD Trail.

This section of Pacific Boulevard, a distance of 0.6 miles, is designed as a four-lane divided urban arterial roadway between Auto World Circle and Cabin Branch, and a four-lane undivided arterial roadway from Cabin Branch to Severn Way. Project traffic volumes in the design year 2030 are expected to be approximately 27,600 ADT (average daily trips).

The project includes twin bridges over the Washington & Old Dominion Trail and a bridge over Cabin Branch. Other project features include a five foot wide sidewalk along the east side of the roadway, a 10 foot wide trail along the west side of the roadway along with connections to the W&OD Trail. CONTRACT AMOUNT \$19 million PROJECTTEAM & ROLES Lead Designer Dewberry Lead Contractor Shirley Contracting Company Design-Build Manager Shirley Design/Build COMPLETION DATE 2010 OWNER Virginia Department of Transportation, Northern Virginia District Office



PACIFIC BOULEVARD DESIGN-BUILD PROJECT

The Shirley D/B Team was responsible for completing all design and engineering, environmental permitting, right-of-way acquisition, utility relocations, construction and quality assurance and quality control for the project. The Team successfully worked with VDOT and an adjacent landowner to add the ultimate turn lanes and intersections to the project, which will avoid future disruptions and reconstruction along the road. Based on this successful coordination, the vast majority of the right-of-way required for the project was dedicated at no cost to VDOT, a savings to VDOT of over \$3 million.

I-66 IMPROVEMENTS PROJECT gainesville, virginia



CONTRACT AMOUNT \$250 million (over five phases)

PROJECTTEAM & ROLES

Lead Designer Dewberry

Lead Contractor Shirley Contracting Company

COMPLETION DATE

2010 OWNER

Virginia Department of Transportation, Northern Virginia District Office

Description

In October 1997, Dewberry was awarded a contract with the Virginia Department of Transportation for the widening of I-66 from 4-lanes to 8-lanes, including HOV lanes, between Route 234 Business in Manassas and Route 29 in Gainesville. As the project progressed through the initial design phase, an additional interchange at the intersection of Route 29 and Linton Hall Road in Gainesville was added to the contract, as well as a new roadway (University Boulevard) connecting Wellington Road and Route 29, including a bridge over I-66 located just east of the Route 29 Interchange. The new interchange at Route 29 and Linton Hall Road includes four (4) new bridges, including two (2) which carry Route 29 and Gallerher Road over the Norfolk Southern Railroad, eliminating two at-grade railroad crossings.

The design of these roadway improvements was ultimately broken into five (5) separate projects with a total estimated construction cost of approximately \$250 million. The first phase of construction, completed in 2005, widened I-66 to eight-lanes, including HOV lanes, between 234 Business and 234 Bypass. The second phase of construction provided the new roadway and overpass of I-66 between Wellington Road and Route 29, now identified as University Boulevard. The fourth and fifth phases, which detail the construction of the Route 29/Linton Hall Interchange, will be completed and advertised in late 2009 and late 2010. Design services provided by Dewberry for the projects included roadway design, bridge and structural design, stormwater management and hydraulic design, lighting





I-66 IMPROVEMENTS PROJECT

and electrical design, traffic management systems (TMS) design, signing and marking and traffic signal design, maintenance of traffic design, and landscaping design.

The third phase extends the eight-lane section on I-66 from Route 234 Bypass to just west of the Route 29 Interchange in Gainesville. This project, with a construction cost of approximately \$76 million, was awarded to Shirley Contracting in December 2006 and completed in 2010. This phase of construction includes complete reconstruction of the existing I-66/ Route 29 Interchange, including five (5) new bridges, four (4) stormwater management ponds, nine (9) interchange ramps, and widening of both I-66 and Route 29.

Dewberry, as a sub-consultant to Alpha Corporation under a separate contract with VDOT, is also providing construction inspection services for the third phase of the project described above..



ROUTE 7/ 607 INTERCHANGE



CONTRACT AMOUNT \$23 million

PROJECTTEAM & ROLES

Lead Designer Dewberry

Lead Contractor Shirley Contracting Company

COMPLETION DATE 2010

OWNER Loudoun County

Description

In December 2007, Loudoun County awarded Dewberry a contract to complete the design and environmental permitting of the single point urban diamond interchange at the intersection of Route 607 (Loudoun County Parkway) and Route 7. The project includes construction of a two span bridge with a deck area of 40,000 square feet, over 400,000 cubic yards of excavation and embankment construction, 13,500 square feet of retaining walls, two box culvert extensions, a precast concrete arch, overhead signs, roadway lighting, a new signal, four new ramps and 0.6 miles of four lane roadway. Dewberry completed the design and obtained VDOT and Loudoun County approval of the interchange in May 2008. Dewberry continued to provide design support including attending construction coordination meetings, answering RFIs, and reviewing and approving shop drawings. Dewberry is also completed all construction inspection for the County to ensure that all work is in compliance with VDOT Standards and Specifications and will be accepted into the VDOT system upon completion.

Separately, Loudoun County awarded Shirley Contracting Company, LLC a \$23 million lump sum contract to construct the grade separated interchange. Shirley was responsible for relocating all utilities on the project including 2,800 linear feet of 30" water main, 2,500 linear feet of a 24" Washington Gas main, and construction of 4,000 LF of common duct bank for use by Verizon, MCI, Abovenet, Qwest Communications, Cavalier Telephone, XO Communications, Level 3, and AT&T. Shirley prepared an aggressive CPM Schedule to integrate the utility relocations and construction activities for completion of the entire project in just eighteen months.



I-95/I-495/I-395 SPRINGFIELD INTERCHANGE IMPROVEMENTS PHASE IV

SPRINGFIELD, VIRGINIA



CONTRACT AMOUNT \$139 million PROJECTTEAM & ROLES Construction Inspection Services Dewberry Lead Contractor Shirley Contracting Company COMPLETION DATE 2004 OWNER Virginia Department of Transportation, Northern Virginia District Office

Desciption

In July 2004, Shirley completed Phase IV of VDOT's Springfield Interchange Improvements Project, known as the "Mixing Bowl." This project called for the construction of four new bridges including a 4,200-foot long flyover ramp from the Capital Beltway Inner Loop to I-95 Southbound. The flyover is the longest inland bridge constructed in Virginia, rising to over 100 feet at its highest point. At a cost of \$139 million, the Phase IV project represents the largest single contract awarded for the entire Springfield Interchange rebuilding project.

Major elements of the project included 500,000 cubic yards of earthwork, 250,000 tons of asphalt concrete, 20,000 linear feet of stormwater and pressure waterlines, 15,000 linear feet of deep sanitary sewer pipe including 2,500 linear feet of micro-tunneling. Shirley designed and constructed 185,000 square feet of absorptive sound barrier walls and erected 150,000 square feet of permanent MSE retaining walls. The project was part of the reconstruction of one of the busiest interchanges on the east coast with extensive and complex maintenance of traffic of the 200,000 plus vehicles per day using the interchange.

The project was highlighted by a complex three-stage bridge built over the heavily traveled railroads of both CSX Transportation and WMATA's Yellow Line. The project was completed ahead of schedule, 4 months in advance of the specified project completion date.

Dewberry performed construction inspection services on the Project.



SPRIGGS ROAD prince william county, virginia

Dewberry was responsible for comprehensive engineering services for Spriggs Road improvements from Route 234 to Hoadly Road in Prince William County, a distance of 4.5 miles. The project involved improving Spriggs Road from a winding rural two-lane road to a four-lane divided urban roadway, per VDOT and Prince William County standards. The project involved pedestrian facilities consisting of a sidewalk and shared use path as well as significant environmental permitting including wetlands, stream impacts, construction activities and a major stream crossing at Powell's Creak. A floodplain study and the submission of proper documentation to all approving authorities were completed by Dewberry. Construction was broken into two contracts requiring additional bidding support.

Comprehensive engineering design services included horizontal and vertical geometric design, drainage design, maintenance of traffic plan design, signing and marking design, landscaping design, retaining wall design, stormwater management basin design and water main relocation design.

Dewberry also provided the construction inspection services including on site and off site material inspections, shop drawing review, response to contractor's RFI's, document control, all necessary materials testing, and coordinating ultimate acceptance with VDOT, PRince William County and the Contractor. CONTRACT AMOUNT \$29 million PROJECTTEAM & ROLES Lead Designer Dewberry Lead Contractor A&W Contracting COMPLETION DATE 2007 OWNER Prince William County



ROUTE 7 / RIVERCREEK PARKWAY INTERCHANGE



CONTRACT AMOUNT \$24 million PROJECTTEAM & ROLES

Lead Designer Dewberry Lead Contractor Shirley Contracting Company COMPLETION DATE 2009

OWNER Kettler Inc.

To improve access to their planned development at the Villages of Leesburg, Kettler proffered a grade separated interchange at the intersection of Route 7 and Rivercreek Parkway. In 2004 Kettler awarded Dewberry a contract to design a spread diamond interchange, including a bridge carrying Rivercreek Parkway over Route 7, ramp connections between Rivercreek Parkway and Route 7, and 3,400 linear feet of four-lane roadway for Rivercreek Parkway and Crosstrail Boulevard. The design required close coordination with VDOT, the Town of Leesburg, and Loudoun County who all had approval authority over the Plans. This included numerous reviews by the Town of Leesburg Board of Architectural Review who added numerous aesthetic elements to the project including ashlar finish and staining of sound barriers and retaining walls, aesthetic panels to disguise the bridge pier, detailed architectural railings and light poles, and extensive landscaping plans.

In 2005, Kettler contracted with Shirley Contracting to complete constructability reviews of the plans and coordinate the extensive utility relocations including a 10" waterline, a 24" Town of Leesburg effluent line, an 8" sanitary sewer, a 30" Dominion Gas transmission line, a 30" Columbia Gas transmission line, 12" and 24" Washington Gas lines, and overhead electric, telephone, and cable TV lines. In our utility coordination efforts, it is always our first priority to identify design options to eliminate the need to relocate utilities. In lieu of relocating the 30" gas transmission lines, the design-build team provided a solution to include a bridge over the Dominion Gas and Columbia Gas easements and Shirley coordinated with the gas companies to eliminate the transmission line relocations at a savings of over \$4 million dollars to the utility relocation budget.

ROUTE 7 / RIVERCREEK PARKWAY INTERCHANGE

In August 2007, Kettler completed separate contracts with Shirley to construct the \$24 million interchange and Dewberry to provide construction inspection services to ensure that the project was complete in accordance with VDOT and Town of Leesburg standards and specifications. The project delivered ahead of schedule in July 2009.

2. PROJECT CHARACTERISTICS

2a. Provide a description of the project, including the conceptual design. Describe the proposed project in sufficient detail so that type and intent of the project, the location, and the communities that may be affected are clearly identified.

The 2006 Bond Referendum enabled Prince William County to use bond financing to construct road improvements on roadways that carry more traffic than they were designed to safely handle. Many of the projects listed in the Bond Referendum have been completed, some are under way, and others are being considered. Two of the projects that remain to be completed (Bond Referendum Project #2 and #6) are Jefferson Davis Highway (Route 1) between Dale Boulevard (Route 784) and Featherstone Road (Route 636) plus Minnieville Road (Route 640) between Dumfries Road (Route 234) and Spriggs Road (Route 643), respectively.

The improvements to both of these roadways will provide significant mobility enhancements to Prince William County, the Virginia Department of Transportation, and the Commonwealth of Virginia. Local citizens, commuters, as well as businesses and government agencies will be provided with improved roadways and pedestrian networks in eastern Prince William County, which will help to reduce congestion and improve safety. The provision of these roadway improvements would be in accordance with the economic development, transportation and public safety elements of the Strategic Plan and furthermore would be substantially consistent with the 2006 Bond Referendum and Prince William County's Comprehensive Plan.

It is understood the Minnieville Road and Route 1 Improvements PPTA would be completely financed utilizing local funds and will therefore be subject to all applicable County and Virginia Department of Transportation ("VDOT") regulations – federal oversight of the project is not anticipated.

The Shirley D/B Team is fully prepared to deliver the Minnieville Road and Route 1 Improvements to Prince William County. To gain a better understanding of the issues surrounding both roadway improvements, the Shirley D/B Team researched available information and conducted numerous field visits to assess the current site conditions, identify constraints and concerns, and gather other useful preliminary information.





The improvements to both of these roadways will provide significant mobility enhancements to Prince William County, the Virginia Department of Transportation, and the Commonwealth of Virginia.



Figure 2-1: Minnieville Road & Route 1 Overall Project Location Map

EXHIBITS

The location of each project within Prince William County is shown on Exhibit 2-1 in larger format at the end of this section. Exhibit 2-1 provides the location of each project within Prince William County. In addition, typical sections and plan view exhibits for each project have been provided to convey important Project information. The narrative that follows describes the Project Characteristics of both roadway improvements.

Jefferson Davis Highway (Route 1)

From Neabsco Mills Road/Blackburn Road (Route 638) to Featherstone Road (Route 636) – Approximately 11,000 LF

Jefferson Davis Highway (Route 1) between Neabsco Mills Road/Blackburn Road (Route 638) and Featherstone Road (Route 636) currently exists as a combination of a rural and urban, four and six-lane, divided and undivided roadway providing an intra and inter-county multi-modal corridor in eastern Prince William County. The area adjacent to the existing roadway alignment is dominated by existing and/or planned urban development as well as FEMA and County floodplains associated with Neabsco Creek and Cow Branch. We understand the County is currently conducting a stream restoration immediately upstream of the Route 1 crossing of Cow Branch. Route 1 contains areas which do not meet current roadway requirements such as sub-standard pavement and shoulder widths, turn lane lengths, and intersection spacing (access management). Between Dale Boulevard/ Rippon Boulevard and Featherstone Road, soils are listed as Category III Problem Soils and are also listed on the County GIS Mapper as erodible, so measures will be evaluated to address erosion and stabilization of these soils.

Numerous overhead and underground utilities exist along Route 1 between Neabsco Mills Road/Blackburn Road and Featherstone Road as well as along most of the connecting roadways within the project area. A significant overhead power transmission line crosses Route 1 just south of Dale Boulevard/Rippon Boulevard as well as Dale Boulevard just east of Neabsco Mills Road. Public water and sewer is extensive within the project area, and as demonstrated on the County's Projected Potable Water and Sanitary Sewer Facility Maps, 12-16 inch and 30-36 inch water mains are planned within the improvement area as well as a 42-54 inch sewer main along Cow Branch.

Right-of-way widths and configurations vary along Route 1 and its connecting roadways, which is the result of adjacent development as well as roadway enhancements throughout the years. Land use within the area of the project varies between public land and open space to office, residential planned communities, and urban residential (high). The project area is completely contained within the Potomac Communities (Neabsco Mills Study Area) Sector Plan, which includes the Potomac Town Center Commerce Center.

Route 1 as well as its major connecting roadways within the project area including the Neabsco Mills Road/Blackburn Road, Vantage Drive, Dale Boulevard/Rippon Boulevard, Delaware Drive, Maryland Avenue, Opitz Boulevard/Reddy Drive, and Featherstone Road intersections currently operate with un-desirable levels-of-service during peak hours. The recently completed Route 1 bridge over Neabsco Creek provided a four to six-lane improvement along Route 1 south of Neabsco Mills Road/Blackburn Road, which also provided for bicycle and pedestrian facilities. In addition, VDOT is currently advancing a project that would replace the traffic signal equipment and optimize signal timing at the intersection of Route 1 and Featherstone Road. The projects just described are intended to upgrade operational characteristics, enhance safety and improve traffic flow along this section of Route 1.

Route 1 in Dale City

Multiple studies and investigations have also been conducted throughout the years with regard to Route 1 and its improvements including the Route 1 Corridor Study, the Route 1 Centerline Design Study, the Route 1 Location Study (Projects A, B, and C), the Bus Rapid Transit Feasibility Study, and the Potomac Communities Advisor Services Panel Report among others. A group of private developers extended Neabsco Mills Road from Dale Boulevard to Optiz Boulevard as a four-lane, divided roadway. This segment completed a network (Neabsco Mills Road, Blackburn Road, Reddy Drive, and Opitz Boulevard) that allows local circulation without utilizing Route 1. In addition, the County advanced and submitted a second round of Route 1 improvement engineering plans (from Neabsco Mills Road/Blackburn Road to Featherstone Road) in October 2008 in response to VDOT comments. Right-of-way acquisition and construction of the improvements was put on hold indefinitely due to lack of funding. The Shirley D/B Team is aware of these issues and will utilize the work previously completed when advancing the project under the guidance and support of the County.

The Shirley D/B Team proposes to improve Route 1 between Neabsco Mills Road/Blackburn Road and Featherstone Road to a six-lane, divided, urban facility with a design speed of 45 mph (VDOT Standard GS-5) in accordance with the Prince William County Comprehensive Plan and prior submittals. Certain modifications to the previous plans and studies as well as updates to permitting elements may be required to accommodate current County and VDOT requirements. Several intersection improvements will be necessary as will a significant improvement to Dale Boulevard/Rippon Boulevard to accommodate the enhancement of Route 1.

Based on current VDOT requirements , the typical section of Route 1 (depicted in Exhibit 2-4) will provide twelve (12) foot lanes, curb and gutter with closed drainage, a sixteen (16) foot raised median (wider in certain locations to facilitate proper intersection operations) as well as necessary left and right turn lanes to provide ingress/egress from connecting roadways. The outermost travel lane in each direction will be four (4) feet wider to accommodate on-road bicycle facilities. Significant changes to access point along both sides of Route 1 may be required to comply with current VDOT access management strategies. The improvements will also include a major crossing of Cow Branch as well as other minor waterway crossings in addition to the necessary stormwater management facilities.



The typical section of Route 1 will provide twelve (12) foot lanes, curb and gutter with closed drainage, a sixteen (16) foot raised median (wider in certain locations to facilitate proper intersection operations) as well as necessary left and right turn lanes to provide ingress/egress from connecting roadways.

A sidewalk adjacent to the northbound lanes and shared use path adjacent to the southbound lanes within the right-of-way will be provided. Reductions to the VDOT standard buffers associated with the sidewalk and/or shared use path as well as retaining walls may be requested to create a consistent corridor along Route 1 as well as limit right-of-way and utility impacts, connect with adjacent work, and conform to the previously advanced design. The design and construction will utilize existing features as much as possible to limit impacts to the motoring public. The conceptual roadway improvements to Route 1 which are based on current VDOT requirements have been depicted in Exhibits 2-2 and 2-3.

Figure 2-2: Route 1 Preliminary Layout

EXHIBITS

The conceptual roadway improvements to Route 1 which are based on current VDOT requirements have been depicted on Exhibits 2-2 and 2-3 in larger format at the end of this section.



It should be noted again that our Team is fully aware of previous Route 1 design efforts undertaken by the County (creation of 100%, un-approved plans), as well as the ongoing stream restoration efforts immediately upstream of the Route 1 crossing on Cow Branch. We will openly discuss the path towards plan approval as it relates to updating design elements associated with these plans. Our previous experience with the Hornbaker Road plans (part of the University Boulevard Extension PPTA) indicates that

VDOT may require that the previously created 100%, un-approved plans be updated in accordance with current standards.

The Shirley D/B Team, in complete coordination with the County and VDOT, may also further explore the grade-separation options previously created for the Route 1/Dale Boulevard/Rippon Boulevard intersection. In order to provide the most value to the County, it may be prudent to provide the grade-separation at this location and forgo a costly at-grade improvement which does not provide the ultimate configuration noted in the Comprehensive Plan.

Figure 2-3: Route 1 Preliminary Layout (cont'd)



The Lead Designer for the Shirley D/B Team, Dewberry, previously conducted the Route 1 Corridor Study on behalf of the County and VDOT and also designed the Route 1/Route 123 interchange. Dewberry was the engineer of record working with Kettler, Inc. (private developer) and was responsible for the design development of a single point urban diamond interchange at the intersection of Route 1 with Route 234, including coordination with the commuter park and ride lot which was recently completed. The interchange design was significantly advanced and coordinated with the County, VDOT, and the Town of Dumfries prior to the project being placed on hold due to a downturn in the real estate development market.

Dewberry also prepared a site plan for a 3,500 seat church (Harvest Life Changers Church) between Neabsco Mills Road and Route 1 just south of Freedom High School, which is currently under construction and nearly complete. During site plan preparation, Dewberry coordinated with the ongoing (at that time) plan development of Route 1. The site plan provided a stormwater management facility for a portion of Route 1 that was draining towards the church site. The facility consists of an oversized underground system and a "stub out" for the future connection to Route 1 drainage. Easements were put in place for future utility relocation and various other coordination items were addressed with the site plan.

Minnieville Road (Route 640) From Dumfries Road (Route 234) to Spriggs Road (Route 643) -Approximately 11,000 LF

Minnieville Road (Route 640) between Dumfries Road (Route 234) and Spriggs Road (Route 643) currently exists as a rural, two-lane, un-divided roadway providing access to Dumfries Road from Dale Boulevard and the shopping area adjacent to Prince William Parkway and Smoketown Road near Interstate 95. The area adjacent to the existing roadway alignment consists of woodlands, residential development, as well as FEMA and County floodplains associated with Powell's Creek and its tributaries. The alignment contains several areas which do not meet current roadway requirements including sub-standard horizontal and vertical geometry, pavement and shoulder widths, sight distances, intersection spacing, as well as drainage accommodations and is currently restricted for thru trucks because of operational and safety concerns. Courage Drive, a significant parallel roadway, currently functions to collect and distribute traffic associated with development north of Minnieville Road near the center of the project area. Minnieville Road's intersections with Dumfries Road, Moonbeam Drive, Harvest Moon Lane, and Spriggs Road have been improved to provide turning lanes and in some cases ultimate roadway features such as curb and gutter and pedestrian facilities.



Minnieville Road



Figure 2-4: Minnieville Road Preliminary Layout



Overhead and underground utilities exist along the majority of Minnieville Road between Dumfries Road and Spriggs Road. Public water and sewer is provided within the more recent development adjacent to Moonbeam Drive near the center of the project as well as along Dumfries Road and Spriggs Road, however, the majority of the remaining properties are served by wells and septic systems. Per the County's Projected Potable Water and Sanitary Sewer Facility Maps, 12-16 inch water mains are planned to run parallel to a majority of improved Minnieville Road and multiple 42-54 inch sewer mains are planned to cross Minnieville Road.

Right-of-way widths and configurations vary along the alignment some of which was dedicated with roadway improvements. The land use between Dumfries Road and Spriggs Road consists of suburban and semi-rural residential with minor convenience retail store near Dumfries Road along with parks and open space associated with Minnieville Manor Park and Howison Homestead Park.



Figure 2-5: Minnieville Road Preliminary Layout (Cont'd)

The Shirley D/B Team proposes to improve Minnieville Road between Dumfries Road and Spriggs Road to a four-lane, divided, urban facility with a design speed of 50 mph (VDOT Standard GS-6) in accordance with the Prince William County Comprehensive Plan and VDOT requirements as well as recently completed sections of Minnieville Road. The typical section of Minnieville Road (depicted in Exhibit 2-7) will provide twelve (12) foot lanes, curb and gutter with closed drainage, a sixteen (16) foot raised median as well as necessary left and right turn lanes to provide ingress/egress from connecting roadways.

A sidewalk adjacent to the westbound lanes and shared use path adjacent to the eastbound lanes within the right-of-way will be provided. This is contrary to the Comprehensive Plan but necessary because significant sections of eastbound Minnieville Road have already been improved including a shared use path. Reductions to the VDOT standard buffer associated with the shared use path may be proposed to create a consistent corridor along this section of Minnieville Road. The roadway improvements will utilize recent enhancements near Minnieville Road's connection with

EXHIBITS

The conceptual roadway improvements to Minnieville Road have been depicted on Exhibits 2-5 and 2-6 in larger format at the end of this section. Dumfries Road as well as Spriggs Road and will also make intelligent use of Courage Drive to facilitate VDOT's Access Management Policies.

The Shirley D/B Team will also provide the necessary FEMA and County floodplain studies associated with Minnieville Road's crossing of Powell's Creek as well as its tributaries. The type of crossing required for Powell's Creek (box culvert, bridge, conspan) will be studied in detail and will be provided in such a way as to address the required hydraulic opening while limiting environmental impacts and associated costs of the crossing. Our Team will also incorporate the necessary stormwater management facilities to current design standards in the project design. Utility relocations, County water and sewer betterments as well as the resolution of impacted wells and septic fields will also be accounted for. The conceptual roadway improvements to Minnieville Road have been depicted in Exhibits 2-5 and 2-6.

The Shirley D/B Team will generate the final Minnieville Road alignment based on gathered project information in such a way as to minimize impacts while satisfying County and VDOT criterion. This will be accomplished by studying potential impacts to right-of-way, utilities, environmental, cultural resources, wetlands, and other sensitive project elements when developing the final alignment. Varying horizontal and vertical geometric elements along with other roadway features will be evaluated in conjunction with the traffic analysis, existing features and other design and coordination efforts to arrive at the most favorable roadway improvements which will then be taken to final design and approval.

The Lead Designer for the Shirley D/B Team, Dewberry, previously designed the section of Spriggs Road for the County at the eastern termini of this project which included the re-alignment of the western approach to the Minnieville Road/Spriggs Road intersection. As part of western approach re-alignment, Dewberry conducted the necessary County Floodplain Study to the unnamed tributary to Powell's Creek beneath Minnieville Road approximately 600 feet west of the Spriggs Road intersection.

Dewberry performed a FEMA floodplain study to analyze the bridge impacts to the Powell's Creek floodplain for the widening of Spriggs Road crossing at Powell's Creek. Dewberry's study of Powell's Creek crossing of Spriggs Road required a Conditional Letter of Map Revision ("CLOMR"), which Dewberry also provided. This crossing (bridge) replaced an existing The Lead Designer for the Shirley D/B Team, Dewberry, previously designed the section of Spriggs Road for the County at the eastern termini of this project which included the re-alignment of the western approach to the Minnieville Road/Spriggs Road intersection
four cell box culvert and ultimately provided the County with a superior, cost-effective hydraulic crossing that passes the design storm event. The Powell's Creek FEMA floodplain extends upstream near the Minnieville Road Crossing which will enable Dewberry to quickly and efficiently model the Minnieville Road crossing. The existing Minnieville Road crossing of Powell's Creek contains five sixty (60) inch CMP's. The Shirley D/B Team will implement the same type of study utilized on the Spriggs Road crossing (bridge verses box culvert verses conspan) to select the Minnieville Road crossing.

Description of Transportation Services

The Shirley D/B Team will be responsible for coordinating with project stakeholders, participating in the public information process, providing survey services, traffic analysis, environmental investigations (including wetland and stream investigations and updates), permitting (as coordinated with the County), VDOT coordination, hydrologic and hydraulic analysis, roadway and structural design, plats, right-of-way acquisition along with public utility re-location design and private utility re-location design coordination as may be required for both roadway improvements (Minnieville Road and Route 1). Further, the Shirley D/B Team will provide construction services in addition to construction inspection services and will prepare record documents required for County and VDOT acceptance.

The Shirley D/B Team will manage activities relating to mapping, land record research, traffic data collection and projection, utility designation and locating, geotechnical investigations and reporting, historic and cultural resource Phase I assessments, as well as material testing during construction.

In a true design-build style, activities such as right-of-way assessments, utility relocation planning, and constructability reviews for both projects will commence simultaneously with preliminary and final design services. Design elements, right-of-way acquisition, utility re-location, and overall construction activities may overlap to ensure oversight as well as provide opportunities for early commencement of certain activities. As appropriate, the Shirley D/B Team will conduct the following activities as applicable to each project as shown in Table 2.1. The proposed schedules for all project activities associated with each project have been included in our Confidential Section 3 as Exhibits 3-5 and 3-6.

IN A TRUE DESIGN-BUILD STYLE, ACTIVITIES SUCH AS RIGHT-OF-WAY ASSESSMENTS, UTILITY RELOCATION PLANNING, AND CONSTRUCTABILITY REVIEWS FOR BOTH PROJECTS WILL COMMENCE SIMULTANEOUSLY WITH PRELIMINARY AND FINAL DESIGN SERVICES.

Table 2.1 Shirley D/B Project Activities

| Project Management | Public Involvement |
|--|--|
| Overall management of the project Accounting and legal services Local project office Insurance, bonds, taxes | Citizen Information meetings Community outreach Public hearing support Project Website |
| ENGINEERING DESIGN AND COORDINATION | Permitting |
| Coordination meetings Right-of-Entry letters Land record research Surveying and mapping Geotechnical investigation Traffic studies Roadway and structural design Transportation management plan Traffic signal design and coordination Hydrologic, hydraulic, stormwater management, and adequate outfall design FEMA and County floodplain studies Subsurface utility investigation Permitting, right-of-way, and utility coordination | Federal clearances Environmental permitting Wetland and stream mitigation Hazardous materials Environmental Site Assessment Phase I investigations Phase I cultural resources investigation Design, right-of-way, and utility coordination |

RIGHT-OF-WAY ACQUISITION

Plats Proffer assessments Appraisals Title reports Offers and negotiations with landowners Settlements, closings and recordation's Preparation of condemnation documentation Design, permitting, and utility coordination

UTILITY RELOCATION

Public utility re-location and betterment design Private utility re-location coordination Determination of prior rights Completion of easement instruments Management of relocation construction Design, permitting, and right-of-way coordination

CONSTRUCTION

Construction management Roadway and structural construction Temporary traffic control plan Erosion and sediment control measures Safety Emergency services coordination Environmental Permit Compliance Monitoring Design, permitting, and utility coordination

QUALITY ASSURANCE AND QUALITY CONTROL

On and offsite inspection Shop drawing review Coordinate and respond to RFI's Document control Quality assurance Conformity with plans and specifications Material testing Certification of completed project Coordination of final acceptance

The Shirley D/B Team will advance both projects in close coordination with Prince William County ensuring that the development of the improvements will be in accordance with all applicable specifications, standards and manuals as well as appropriate environmental and permitting documentation and other regulatory documents and plans. The Shirley D/B Team will construct both projects in accordance with the approved design and all applicable construction specifications and standards, coordinating closely with construction administration staff members from both Prince William County and VDOT.

Critical Success Factors

Several factors will be critical to the success of the Jefferson Davis Highway (Route 1) and Minnieville Road (Route 640) improvements which include:

- AGREEMENT WITH PRINCE WILLIAM COUNTY to work in partnership during the right-of-way acquisition process for possible condemnation or quick property takings as required.
- SYNCHRONIZATION WITH VDOT, the County, the general public, adjacent developers, and all other stakeholders during all phases of Project.
- COORDINATION WITH DEVELOPERS as well as other land owners to ensure there will be no conflicts with the proposed construction and to incorporate any available developer proffer obligations as part of the project work.
- **COLLABORATIVE PUBLIC INFORMATION EFFORTS** by the public-private partnership working together with similar goals and objectives.
- **INTELLIGENT, APPROPRIATE, CONSTRUCTIBLE, AND COST EFFECTIVE DESIGN** to offer value while meeting Project requirements.

- ADHERENCE TO THE PROPOSAL SCHEDULE.
- **TIMELY AND COST EFFECTIVE UTILITY RELOCATIONS** and betterments.
- Well-TIMED PROCESSING OF PERMITS, reviews, and approvals.
- **STRICT CONTROLS DURING CONSTRUCTION** on safety, quality, schedule, and payment.

2b. Identify and fully describe any work to be performed by the County or any other public entity.

If required, Prince William County will be asked to use its power of eminent domain to assist with right-of way acquisition to facilitate the design/build process for the improvements associated with these Projects. The Shirley D/B Team has included acquisition of all right-of-way required for the Project and would request the County's assistance in the event of a quick-take or condemnation.

The County would also assist in coordination of an expedited review process with County staff and VDOT as necessary and would provide all relevant information necessary for the advancement of both roadway improvements such as adjacent develop plans, public facility information, and other publicly held information.

Our Team will be responsible for the overall coordination necessary for private utility re-locations and will also work with the County regarding public utility re-locations and betterments. The Shirley D/B Team would request the County's assistance in matters that pertain to pervious County agreements with private utility owners as well as payment to the utility companies in accordance with the contract as negotiated.

Lastly, our Team will perform the work necessary to obtain the needed environmental clearances and permits and would request that the County provide mitigation costs as may become necessary. *2c. Include a list of all federal, state and local permits and approvals required for the project and a schedule for obtaining such permits and approvals.*

The overall Project schedule will rely heavily on obtaining the appropriate environmental clearances and approvals in a timely manner. The Shirley D/B Team is well versed in navigating through these clearances and approvals incorporating the necessary time frames into the schedule to deliver a Project on time and within budget. Our Team will utilize a holistic environmental approach that is unique to the industry. Environmental considerations will be integrated and thoroughly considered at each stage of development including planning, design, permitting, and construction. This approach will ensure compliance but will also incorporate construction methodologies into the planning and design minimizing costs and delays.

In our experience with PPTA projects, VDOT will require the completion of the Natural Resources Due Diligence Checklist (EQ-555) as well as the Hazardous Materials Due Diligence Form (EQ-121) and the Early Project Notification Form (EQ-429). These forms will require coordination with several of the State and Federal Resource Agencies. The Shirley D/B Team will be proactive in working with these agencies as initiating contact prior to the permit applications stage will give them a greater sense of the Project, reduce the time associated with additional meetings, and assist designers in avoiding or minimizing impacts to resources.

As these Projects will be completely financed utilizing local bond funds they will be subject to all applicable County and VDOT regulations (federal oversight of the project is not anticipated). The Shirley D/B Team is prepared to obtain all required permits and will coordinate with Prince William County and other agencies as necessary.

The narrative that follows as well as Tables 2-2 and 2-3 provide an overview of the environmental clearances and permits which will be required for both roadway improvements associated with this Project.

Jefferson Davis Highway (Route 1) From Neabsco Mills Road/Blackburn Road (Route 638) to Featherstone Road (Route 636)

Jefferson Davis Highway (Route 1) between Neabsco Mills Road/Blackburn Road (Route 638) and Featherstone Road (Route 636) contains two major 100 year floodplains at Cow Branch and Neabsco Creek (at the Neabsco Mills Intersection). Dewberry is a national and regional leader in floodplain modeling and will review the crossing as previously advanced by the County to verify that the most efficient crossing will be provided. If additional analysis becomes necessary, Dewberry will provide the necessary models and means to obtain the needed approvals.

We did note the original Route 1 design plans submitted to VDOT called for a wetland mitigation site adjacent to Route 1 within the limits of the mapped floodway and floodplain associated with Cow Branch. It is unclear as to the analysis level previously conducted on the floodplain, but our Team is well versed in the level of study, clearances, or necessary re-design that may become necessary to obtain the required clearances.

Due to the highly developed nature of this corridor, few wetland systems remain along this section of Route 1. However, the project will involve several stream crossings noted in Table 2-2. These crossings may contain small wetland areas adjacent to the stream channel, but we anticipate wetland impacts to be minimal. We understand that the County is currently conducting a 1,400 linear foot stream restoration on Cow Branch just upstream of the Route 1 crossing. The Shirley D/B Team will coordinate the design of the Cow Branch Crossing with the County to work with the previous restoration efforts and will utilize the new stream limits and cross section in the necessary floodplain modeling. See Table 2-2 for details on the types of permits anticipated.

Table 2-2 summarizes the environmental issues associated with the Route 1 improvements and the anticipated environmental permits.

| Project Constraint | Agency | Permit /Clearance | Solution | Resource Detail |
|---|--|--|--|--|
| 100 Year Floodplains | FEMA | CLOMR/LOMR** | Cost effective crossing which passes necessary storm event | Cow Branch and Neabsco Creek depending upon final design. |
| Waters of the U.S. and Wetland Crossings | DEQ, USACE, VMRC | VWP, SPGP, GP – subaqueous bed** | Avoid and/or minimize impacts, mitigate as required and obtain permits | Cow Branch and Unnamed Tributary to Cow Branch |
| Hazardous Materials Asbestos & Lead Paint | VDOT / DEQ EPA (RCRA/ CRCLA) VA Department of Labor & Industry | Phase I ESA for ROW due diligence & VDOT EQ-121 VPDES permit (contaminated groundwater**) Notification for Demolition/ Renovation Form ** | Prepare Phase I Environmental Site Assessments to limit liability | 10 reported petroleum releases and 8 small quantity generators Concrete culverts & structures could contain asbestos |
| Threatened and Endangered Species and Anadromous Fish | DGIF VDACS/VDNH FWS NMFS | Consultation during permit coordination | Early coordination, time of year restrictions for in stream work and near active nests likely | Potential Wood Turtle, Anadromous Fish, Bald Eagle nest proximity, Small Whorled Pogonia (undisturbed areas) |
| Non-Point Source Discharges | DCR | Virginia Stormwater Management Program Permit | Prepare comprehensive E&S and SWM plans, file registration statement with DCR and prepare a SWPPP. | Project Construction Land Disturbance over 2,500 Square Feet. Problem Soils – Highly erodible & high plasticity soils Constrained ROW |

Table 2-2 Route 1 Improvements Environmental Permits

**as necessary; DCR – Virginia Dept. of Conservation and Recreation; FWS – U. S. Fish and Wildlife Service; DGIF – Virginia Department of Game and Inland Fisheries; Environmental Protection Agency; USACE – U. S. Army Corps of Engineers; DEQ – Virginia Department of Environmental Quality; FEMA – Federal Emergency Management Agency; VDCR-DNH – DCR Division of Natural Heritage; VDACS – Virginia Department of Agriculture and Consumer Services The Shirley D/B team has obtained over 25 permits Clean Water Act (CWA) Section 404/401 for well over 100 individually impacts areas including over 50 miles of design-build roadway improvements over the last 9 years. The Shirley D/B team has obtained over 25 permits Clean Water Act (CWA) Section 404/401 for well over 100 individually impacts areas including over 50 miles of design-build roadway improvements over the last 9 years. We have the experience essential to obtain the necessary permits and clearances to see the Project to successful completion.

The Shirley D/B Team conducted a review of the potential to encounter hazardous materials during right-of-way acquisition and construction. Records review detailed between 6 and 10 petroleum releases within the Route 1 project area. Eight (8) properties were listed as RCRA Hazardous Waste Small Quantity Generators within the corridor. Our Team has a long history of addressing and mitigating these issues during right-of-way acquisition, utility relocations, and roadway construction. We will conduct detailed records reviews and ascertain liability prior to right-of-way acquisition and will adjust the design development to avoid or minimize exposure, where practicable.

Our Team conducted a review of readily available databases and found no documented occurrences of Threatened & Endangered species within the project area. However, there will be a potential to encounter the species noted in the Table below or have their associated time of year restrictions affect the project scheduling. The Shirley D/B Team is well versed in the completion of surveys and agency coordination necessary to address any species issues and see the project through permitting and final construction.

Minnieville Road (Route 640)

From Dumfries Road (Route 234) to Spriggs Road (Route 643)

Minnieville Road (Route 640) between Dumfries Road (Route 234) and Spriggs Road (Route 643) provides access to Minnieville Manor Park and Howison Homestead Park as well as the Winding Creek Community Center. Design efforts will focus on avoiding impacts to these parklands in addition to maintaining access to these facilities in coordination with the County and VDOT.

Powell's Creek and two unnamed tributaries to Powell's Creek cross Minnieville Road within the area of the project. Powell's Creek and one of its unnamed tributary east of Howison Homestead Park contain Resource Protecting Areas ("RPA's"). The Shirley D/B Team will make every effort to minimize roadway impacts and avoid the placement of stormwater management facilities within RPA boundaries wherever practicable. As previously noted, Dewberry conducted the necessary County Floodplain Study to the unnamed tributary to Powell's Creek which crosses beneath Minnieville Road approximately 600 feet west of Spriggs Road. Dewberry also completed the FEMA floodplain study to analyze the impacts to the Powell's Creek floodplain due to the widening of Spriggs Road including the associated CLOMR. Our Team will fully utilize previous studies for the benefit of this Project.

Powell's Creek and one of its unnamed tributary east of Howison Homestead Park also contain major 100 year floodplains and floodways. Our Team will review several crossing alternatives, prepare complete cost and consequence matrices of each alternative for each crossing, and will provide the necessary models and analysis to obtain the needed approvals from the regulatory agencies.

Several wetland areas exist along this section of Minnieville Road. The most notable being a large forested wetland system along the downstream section of the Powell's Creek crossing. The upstream section of this crossing contains an emergent wetland area. The crossings of the other unnamed tributaries noted below also contain associated wetland areas, but the minor widening in these areas is not anticipated to generate significant impacts. Our environment professionals will work closely with design engineers to avoid and minimize impacts to wetlands and streams, and ultimately provide a cost effective design that is also easily permitted. See Table 2-3 for details on the anticipated permits.

The Shirley D/B Team conducted a review of the potential to encounter hazardous materials during right-of-way acquisition and construction. Records review detailed one petroleum release site adjacent to the Minnieville Road project area. Our Team will address these issues during design development. We will conduct detailed records reviews and ascertain liability prior to right-ofway acquisition and will adjust the design to avoid or minimize exposure, where practicable.

Our Team conducted a review of readily available databases and found no documented occurrences of Threatened & Endangered ("T&E") species within the project area. However, there is a potential to encounter the species noted in the Table below. Our Team is well versed in the completion of necessary surveys and agency coordination to address any T&E species issues and see the project through permitting and final construction.

Table 2-3 below summarizes the environmental issues associated with the Minnieville Road improvements and the anticipated permits.

THE SHIRLEY D/B TEAM CONDUCTED A REVIEW OF THE POTENTIAL TO ENCOUNTER HAZARDOUS MATERIALS DURING RIGHT-OF-WAY ACQUISITION AND CONSTRUCTION. OUR TEAM WILL ADDRESS THESE ISSUES DURING DESIGN DEVELOPMENT.

Table 2-3 Minnieville Road Improvements Environmental Permits

| Project Constraint | Agency | Permit /Clearance | Solution | Resource Detail |
|---|--|---|--|--|
| 100 Year Floodplains | County FEMA | County Floodplain Study CLOMR/LOMR** | Cost effective crossing which passes necessary storm event | Unnamed tributary to Powell's Creek Powell's Creek |
| Waters of the U.S. and Wetland Crossings | DEQ, USACE, VMRC | VWP, GP – subaqueous bed** Corps of Engineers Individual Permit | Avoid and/or minimize impacts, mitigate as required and obtain permits | Two unnamed tributaries to Powell's Creek & Powell's Creek and associated wetlands. |
| Hazardous Materials, Asbestos, and Lead Paint | DEQ EPA (RCRA/ CRCLA) Department of Labor and Industry | Phase I ESA for ROW due diligence. VPDES permit, if contaminated groundwater is encountered | Prepare Phase I Environmental Site Assessments to limit liability | One documented petroleum release on Courage immediately adjacent to Minnieville & up- gradient of project. |
| Threatened and Endangered Species | DGIF and FWS VDACS/VDCR-DNH | Consultation during permit coordination | Avoidance of populations. Early coordination, time of year restrictions for in stream work | Potential for Small Whorled Pogonia and Wood Turtle |
| Well and Septic Impacts | Prince William County Health Dept. | Sewerage Disposal and/or Water Supply Permits | Avoid where possible, replace or provide County hook up. Acquire necessary permits | The majority of residential units west of Powell's Creek are on individual well and septic. |
| Non-Point Source Discharges | DCR | Virginia Stormwater Management Program Permit | Prepare comprehensive E&S and SWM plans, file registration statement with DCR and prepare a SWPPP. | Project Construction Land Disturbance over 2,500 Square Feet. |

**As necessary

2d. Identify any anticipated adverse social, economic, environmental and transportation impacts of the project measured against the County's comprehensive land use plan and applicable ordinances and design standards. Specify the strategies or actions to mitigate known impacts of the project.

Social Impacts

Our Team will utilize available information and will gather additional local information to identify the potential socio-economic effects of each roadway improvement. However, it is not anticipated that any direct or indirect adverse effects will occur to local and regional public health and safety or minority and low-income populations by the advancement of the Project. Access to bus facilities and the limited pedestrian facilities will be maintained as much as possible during construction, but temporary impacts are anticipated. Overall the project will provide a higher level of access for minority and low income populations and the general public by providing pedestrian facilities and shoulders in this constrained corridor.

Economic Impacts

Adverse economic impacts are anticipated to be minimal for the Route 1 improvements. Adjacent areas consist mostly of residential type development with buildings already setback from Route 1 which will not experience direct impacts. Other neighboring areas are comprised of public land and/or open yet to be developed. Toward the extreme southern end of the Route 1 improvements as well as near the northern limits, minor impacts to existing businesses such as Cowles Nissan and Karen Radley Volkswagon are anticipated. These impacts will be minor, mostly occurring during construction and should have very little future economic impact to those businesses. Our Team will work with the land owners through the completion of design to ensure impacts are minimized and that access is maintained during and after construction as allowable based on current design criteria.

Adverse economic impacts along the Minnieville Road enhancements are not expected as the vast majority of adjacent land is residential or park space.



THE SHIRLEY D/B TEAM IS WELL VERSED IN NEGOTIATING THESE TYPES OF ENVIRONMENTAL ISSUES.

Environmental Impacts

It is anticipated that adverse environmental impacts associated with these projects will be primarily limited to impacts to Waters of the U.S. including wetlands, and hazardous materials. The Minnieville Road improvements are anticipated to have a greater impact on wetlands and waters while the Route 1 improvements are expected to have a higher level of hazardous materials concerns.

The Shirley D/B Team will conduct a wetland delineation and have the boundaries surveyed. These boundaries will be verified by the Corps of Engineers during a jurisdictional determination, in order to determine roadway impacts to waters of the U. S. including wetlands. Several cultural assets were identified on existing data, some appear to have been previously impacted by development. No federal or state endangered and or threatened species have been documented within or adjacent to the proposed project areas, but a few species have the potential to be present. Surveys for these resources may be required as part of the permitting process. We do not anticipate that these issues will cause significant delay to either project, but they will require coordination with the appropriate agencies. The Shirley D/B Team is well versed in negotiating these types of environmental issues.

Impacts to wetlands and streams will require compensatory mitigation. First, our Team will coordinate and negotiate with the permitting agencies to determine the exact amount of impacts requiring compensation. Various options exist for wetland compensation, including the purchase of credits at mitigation banks, wetland creation/restoration, and stream restoration. For purposes of this proposal, it is assumed that impacts to vegetated wetlands will be mitigated through wetland banking. Three options exist for addressing stream impacts. These are on-site mitigation, purchases from an approved wetland bank and payments into the trust fund. Purchasing from an approved wetland and/or stream bank may prove to be the most feasible mitigation option for these projects. Shirley D/B will investigate all options available.

Transportation Impacts

Adverse impacts to transportation along Minnieville Road as well as along Route 1 will be confined to temporary impacts during construction while the improvements are being built and to potential access management requirements which may reduce the number and frequency of access points along the roadways. The Shirley D/B Team will focus on maximizing safety and mobility along the roadways while minimizing impacts to adjacent landowners. Our Team will explore the possibility of shared-use entrances, internal site circulation and interconnection, in addition to the use of frontage roads where appropriate. We will also work to preserve mobility on the impacted roadways during construction by providing an enhanced Transportation Management Plan ("TMP") that will fully consider work zone roadway capacity, local traffic operational issues, as well as worker safety. Our TMP will maintain pedestrian and vehicle access as much as practicable and will minimize detours and crossovers. Roadway closure times, incident response plans, and law enforcement will be appropriately implemented along with other TMP strategies to ensure the safe and efficient movement of vehicles through the project areas.

WE WILL ALSO WORK TO PRESERVE MOBILITY ON THE IMPACTED ROADWAYS DURING CONSTRUCTION BY PROVIDING AN ENHANCED TRANSPORTATION MANAGEMENT PLAN THAT WILL FULLY CONSIDER WORK ZONE ROADWAY CAPACITY, LOCAL TRAFFIC OPERATIONAL ISSUES, AS WELL AS WORKER SAFETY.





PERHAPS THE SINGLE MOST IMPORTANT ASPECT WILL BE THE IMPROVEMENT TO DRIVER SAFETY AND TRAFFIC OPERATIONS ON ROADWAYS THAT CURRENTLY CARRY MORE TRAFFIC THAN THEY WERE DESIGNED TO CARRY. *2e. Identify the projected positive social, economic, environmental and transportation impacts of the project measured against the County's comprehensive land use plan and applicable ordinances and design standards.*

The implementation of the Route 1 and Minnieville roadway improvements delivered under the Public Private Transportation Act ("PPTA") will result in significant social, economic, environmental, and transportation benefits. By delivering these vital roadway improvements in accordance with the County Comprehensive Plan and other relevant guidance in an expedited design-build fashion, safer, more reliable roadway networks that will improve regional and local commuting can be delivered in the shortest amount of time. These roadway improvements will aid emergency response times, allow for the expansion of public services, and provide additional pedestrian and non-motorized facilities. The enhancements will provide inherent environmental benefits due to improved traffic operations ultimately allowing for socio-economic development and re-development opportunities in Prince William County.

Perhaps the single most important aspect will be the improvement to driver safety and traffic operations on roadways that currently carry more traffic than they were designed to carry. Reducing congestion will in turn reduce accidents, lower travel times between destinations, and promote safer driving conditions. The transportation investment will provide time savings for businesses and residents travelling on these roadways which can translate into higher productivity for local businesses. Investment in transportation infrastructure can also boost tourism and improve the quality of life for area residents.

These improvements will make it more convenient for residents to reach destinations for work, shopping, recreation, and entertainment. The improvements will also enhance visual aspects of the corridors, improve drainage related issues and because no significant loss of business is anticipated, improve the vitality of the project areas and allow for additional growth.

2f Identify the proposed schedule for the work on the project, including sufficient time for the County's review and the estimated time for completion.

Project Schedule

Conceptual Project Schedules for the Route 1 Improvements project and the Minnieville Road project are included in Section 3, as Exhibits 3-5 and 3-6. The proposed schedules list general activities required for planning and executing the Projects. The concept is intended to be a starting point in discussions with Prince William County with the mutual objective of developing detailed schedules as part of the Detailed Proposal Phase.

While the proposed schedules are aggressive, they incorporate the following timesaving methodologies:

- PARTNERING AMONG PRINCE WILLIAM COUNTY, VDOT, and the Project Team;
- **IN-LINE COORDINATION, REVIEW, AND APPROVAL** of planning studies; environmental permitting, and design plans and specifications with Prince William County, VDOT, and other agencies;
- Acouisition of RIGHT-of-way performed by the Team;
- UTILITY RELOCATIONS PERFORMED IN ADVANCE OF road construction;
- DESIGN-BUILD TECHNIQUES;
- "Fast-track" METHODS, such as fast tracking permitting; and
- VALUE ENGINEERING efforts during design and construction.

These time-saving methodologies or any fast-track process will not circumvent the public involvement process. Furthermore, safety and quality will remain critical from initial concepts to final construction completion. 2g. Propose allocation of risk and liability, and assurances for timely completion of the project.

Design and Construction Liability

The liability for the design and construction of the Projects will rest with the Project Team. All work will either meet or exceed current county, state and local guidelines. Subcontractors will be required to bond their work, and all design work will be submitted to Prince William County for approval. Construction Administration and Inspection will be provided by the Project Team, with Prince William County in an oversight role.

The Shirley D/B Team will provide assurances of timely completion of the Project to Prince William County in the form of payment and performance bonds. In addition, as part of the ultimate Comprehensive Agreement for the Project, a provision for liquidated damages will be included.

2h. State assumptions related to ownership, legal liability, law enforcement and operation of the project and the existence of any restrictions on the County's use of the project.

Project Ownership

Upon completion of improvements, the Projects will be turned over to the Virginia Department of Transportation for acceptance into the state's system. Our Team, in conjunction with Prince William County, will be responsible for acceptance by VDOT upon completion of the work.

Legal Liability

Our Project Team assumes legal liability normally associated with a design/ build project. Legal liability associated with ownership rests with Prince William County and/or the Virginia Department of Transportation after the Project Team completes the projects and turns them over to VDOT.

Law Enforcement

The Virginia State Police and Prince William County Police will patrol the Projects as appropriate. Details will be addressed in the Comprehensive Agreement.

Operation of Facilities

Upon completion of construction of the Projects, and acceptance by VDOT, the responsibility for operations and maintenance of the Projects will be transferred to VDOT.

2i. Provide information relative to phased openings of the proposed project.

Phased Openings

It is the intent of the Project Team to minimize disruption to the traveling public during the construction of the Project. Minimizing disruption begins with minimizing the duration of the Projects. Getting the Projects started quickly and finished on time – on an aggressive schedule – will deliver the greatest convenience to the public.

We plan to construct the Projects with a minimum of disruption to traffic. As each of the Projects are widening to existing facilities, maintenance of traffic will be a significant element of the work and the Project Team will develop maintenance of traffic plans that will minimize disruptions to the traveling public. To the extent that sections or phases of the completed projects can be safely opened to traffic, our Team will do so.



3. PROJECT FINANCING

Due to the confidential and proprietary nature of this response it has been included only in the confidential volume of this proposal submission.

3. PROJECT FINANCING

INTRODUCTION

The proposed improvements to Minnieville Road and Route 1 were included as part of the 2006 voter approved Road Bond Referendum. Prince William County is authorized to sell bonds to finance the construction of Minnieville Road from Route 234 to Spriggs Road and the Route 1 Improvements from Blackburn Road/Neabsco Mill Road to Featherstone Road.

Question 3a. Provide a preliminary estimate and estimating methodology of the cost of the work by phase, segment or both.

Shirley D/B is proposing to design, construct, and provide quality control/quality assurance services for the Minnieville Road and Route 1 Improvements Projects, for a fixed price and delivery on a date-certain schedule under the Prince William County PPTA program. Our conceptual cost estimates for the Projects are described in Tables 3.1 and 3.2, Preliminary Cost Estimates. These estimates include all costs associated with the project descriptions provided in Section 2, Project Characteristics. SHIRLEY D/B WILL ASSEMBLE AND MANAGE THE ENTIRE DESIGN, PERMITTING, RIGHT-OF-WAY ACQUISITION, UTILITY RELOCATIONS AND CONSTRUCTION TEAM, REMAIN ACCOUNTABLE FOR THE **PROJECT SCHEDULE** AND BUDGET, AND ENSURE THE PROJECT IS DELIVERED FOR A FIRM FIXED PRICE AND ON A SCHEDULE ACCEPTABLE TO THE COUNTY.

Table 3.1 Preliminary Cost EstimatesRoute 1 Improvements

| ITEM | COST |
|--|--------------|
| PROJECT MANAGEMENT AND ADMINISTRATION, DESIGN, CONSTRUCTION, QA/ QC | \$42,893,000 |
| RIGHT-OF-WAY ACQUISITION ALLOWANCE | \$9,315,000 |
| UTILITY RELOCATION ALLOWANCE | \$5,015,000 |
| ENVIRONMENTAL MITIGATION ALLOWANCE | \$649,250 |
| TOTAL COST | \$57,872,225 |

* The amounts shown for Right-Of-Way Acquisition, Utility Relocations, and Environmental Mitigation are allowances. Costs in excess of the allowance will be the responsibility of the County or as otherwise negotiated as part of the Comprehensive Agreement. Under runs in costs for the allowances items will result in a cost savings to the County. Our Team of dedicated in-house right-of-way and utility relocation experts are experienced in developing realistic and achievable estimates of the costs associated with these activities.

Table 3.2 Preliminary Cost Estimates - Minnieville Road

| ITEM | COST |
|---|--------------|
| PROJECT MANAGEMENT AND ADMINISTRATION, DESIGN, CONSTRUCTION, QA/ QC | \$29,575,000 |
| RIGHT-OF-WAY ACQUISITION ALLOWANCE | \$685,000 |
| UTILITY RELOCATION ALLOWANCE | \$2,604,000 |
| ENVIRONMENTAL MITIGATION ALLOWANCE | \$869,800 |
| TOTAL COST | \$33,733,800 |

The methodology used to develop the Conceptual Proposal Estimates includes the following items:

- PROJECT MANAGEMENT AND ADMINISTRATION, DESIGN, CONSTRUCTION, AND OA OC – This includes the professional services of the Design Team including professional services for permit acquisition and required environmental mitigation, management resources and necessary support for the overall management of the Project including management of utility relocations and right-of way acquisitions, and any resources and support for the Project's CEI control and documentation. All construction related costs associated with completing and inspecting the Projects are in accordance with applicable VDOT and Prince William County standards.
- RIGHT-OF-WAY ACQUISITION ALLOWANCE Having researched the available public documents, the allowance for the necessary right-of-way needs was determined. Then a value was determined for purchasing the needed property, which is based on the Team's experience in acquiring right-of-way. Our Project Team has significant experience in acquiring right-of-way under a PPTA procurement. The ultimate cost of acquisition of right-of-way will be determined at the earliest time possible after a Comprehensive Agreement has been signed. We have included Exhibits 3-1 and Exhibit 3-2 which identify the parcels required for construction and/or easements as well as current property valuation information that was used in determining the value included in the Conceptual Proposal estimate. The prices

we have identified for right-of-way acquisition have been increased 30%. This increase reflects the difference in appraised values as identified in County land records and our estimate of actual market values. We have also included an estimate of property damages.

- UTILITY RELOCATION ALLOWANCE This allowance represents our Team's conceptual estimate for managing and facilitating the relocation of existing utilities that conflict with the proposed roadway improvements. We have researched available information regarding the utilities in conflict based on our Team's experience on other PPTA projects in VDOT and projects in Prince William County. We are confident the allowance is reasonable. Exhibit 3-3 and Exhibit 3-4 outline the conceptual utility relocation allowance for each of the Projects.
- ENVIRONMENTAL MITIGATION ALLOWANCE This allowance is our Team's estimate of the required environmental mitigation required for the Projects.
- **DIFFERING SITE CONDITIONS** Our Team has performed preliminary investigation of the potential for differing site conditions as defined in VDOT's 2007 VDOT Road and Bridge Specifications Section 106.04(a). Our conceptual estimate includes addressing differing site conditions and includes dealing with the differing site conditions we expect to encounter during construction. Should our Team be asked to provide a Detailed Proposal for the project, we will further investigate the risk of differing site conditions and address it in that proposal. Should Prince William County require an alternate concept for addressing this risk our Team would consider that option.

Shirley D/B's conceptual estimate of the cost of the Minnieville Road and Route 1 Improvements Projects are based on the conceptual alignment and typical sections which are included in Section 2, Project Characteristics as Exhibits 2-2 through 2-7. During the Detailed Proposal Phase the alignments will be confirmed and all project costs will be reviewed, updated and verified as necessary.

While additional work needs to be completed to confirm the various environmental, traffic, engineering, and construction issues associated with these alignments, our design team has investigated the proposed alignments providing the Team with a significant level of confidence at this conceptual stage. Our conceptual estimate for the Minnieville Road and Route 1 Improvements Projects are based upon currently available information as well as Shirley D/B's knowledge and experience of the costs associated with the design and construction of design/build projects of similar scope and complexity.

Question 3b Submit a plan for the development, financing and operation of the project showing the anticipated schedule on which funds will be required. Describe the anticipated costs of and proposed sources and uses of such funds, including any anticipated debt service costs. The operational plan should include appropriate staffing levels and associated costs based upon the County's adopted operational standards.

All development activities required to complete the project will be performed and coordinated by the Shirley D/B Team. Our Team has significant PPTA development experience and we plan to utilize our expertise on these projects to the benefit of Prince William County.

Our Development Team, as part of its work, will investigate all available proffers and associated funds and work with Prince William County to ensure they are available and applied to the Project in a timely manner. We plan to investigate and provide information regarding available proffers as part of the Detailed Proposal Phase.

Tables 3.1 and 3.2 provide preliminary cost breakdowns of the Project costs. As part of the Detailed Proposal, our Team will provide detailed project cash flow requirements which will be tied to the ultimate project schedule.

Sources of Funds

We anticipate that Prince William County will provide bond fund proceeds as the primary source of funds to design and construct the project. If other funds such as cash proffers are available or have already been made to the County, we would request that these funds be made available to the project as well. We will also identify any proffers that may be available and work with the County to apply those to the project as well.

Summary

We anticipate that upon the completion and acceptance of the Projects, Prince William County will request that the improvements be accepted into the Virginia Department of Transportation's system for maintenance. Our Team will work with the County to expedite the transfer of the improvements into the VDOT system.

PROPRIETARY

One of the benefits that a Public Private Transportation Act proposal offers to the County is the reduction of County resources that are required to oversee the project. In a traditional Design/Bid/Build procurement, County staff would be required to be involved in and oversee the Project through all phases. As proposed, the Shirley D/B Team will assume the responsibilities of County staff for project oversight. The County will have a key role in the project, and oversight by the County will be required, but the proposed method of procurement will significantly reduce the County's overhead.

Question 3c. Include a list and discussion of assumptions underlying all major elements of the plan.

Certain assumptions have been made and directly tie to the financial plan of this proposal. They are as follows:

- The amounts shown for Right-Of-Way Acquisition, Utility Relocations, and Environmental Mitigation are allowances. Costs in excess of the allowance will be the responsibility of the County. Under runs in costs for the allowance items will result in a cost savings to the County. Our Team of dedicated in-house right-of-way and utility relocation experts are experienced in developing realistic and achievable estimates of the costs associated with these activities.
- The County will provide the funds necessary to design and construct the Projects.
- Currently, the Team has proposed to manage all aspects of the Right-of-Way Acquisition and Utility Relocation processes.
- No significant environmental issues exist.
- Roadway Maintenance is not part of this proposal.
- The Shirley D/B Team will investigate and utilize all available proffers that are committed to the Project. Available proffer funds will reduce the amount of funds needed to construct the Project.
- Coordination with developer's construction. In the event we are required to coordinate with any developer proffered improvements that may be under construction at the time of our work, the Shirley D/B Team will contact and work with the developer to insure the improvements are coordinated and implemented with ongoing construction operations of the Shirley D/B Team.



3d. Identify the proposed risk factors and methods for dealing with these factors. Describe methods and remedies associated with any financial default.

Project Risks:

- Should significant Permitting and Environmental issues impact the project, we have the needed resources and experience to identify the best possible solutions.
- In order to address the ROW and Existing Utility challenges, it may become necessary to develop design solutions to avoid delays. The Shirley D/B Team has had great success on our previous PPTA and design-build projects with mitigating right-of-way needs and utility relocations.
- If the discovery of hazardous materials, archaeologically significant sites, and/or artifacts which could impact the Project arises, the Shirley D/B Team will perform Phase I investigations and will work with the County to mitigate any additional costs required to further investigate or mitigate these issues.

3e. Identify any local state, local or federal resources that the Proposer contemplates requesting for the project along with an anticipated schedule of resource requirements. Describe the total commitment, in any, expected from governmental sources and the timing of any anticipated commitment, both one-time and on-going.

The Shirley D/B Team will request that the County contribute the funds required for the construction of the Projects. We will work with Prince William County to develop a payment schedule that meets the County's anticipated funding availability.

3f. Identify the need if any, for the County to provide either its general obligation or moral obligation backing. The underlying assumptions should address this need and/or state that the credit would via a "Service Agreement," for example. Any debt issuance should be expected to receive an investment grade rating from a nationally recognized statistical rating agency. If the natural rating is not investment grade, the County may require the use of credit enhancements.

We believe the Project does not require a specific tie to the County's obligation for financing the cost of the Project beyond what is already in place. *3g.* Outline what impact, if any, a drop in interest rates would have on the ultimate annual project cost. Indicate if there is a method to refinance for cost savings or does the firm only receive the benefit of this potential?

Based on our understanding of the County's financing plan for the Projects we do not believe there will be an impact to the projects costs should there be a drop in interest rates. Any drop in interest rates would only be of benefit to the County and not the design-builder of the project.

3h. Outline the financial penalties, if any, that would result should the County wish to terminate a project early or restructure the cash flows for some reason of its own choosing. The firm should be specific on this point.

Should the County have the need to terminate the Projects early or restructure the project cash flows, our Team would be willing to negotiate termination or restructuring costs with the County at such time. We would anticipate that the Comprehensive Agreement for the Projects would include the required language to address these issues.

3i. Provide a breakout of the fees to any underwriting firm(s) and the type of obligation the firm(s) are using with a financing component. Be specific as to tax exempt, taxable, floating rate, fixed rate, etc.

There will be no underwriting fees as part of the plan of finance

4. PROJECT BENEFIT AND COMPATIBILITY

4a. Identify who will benefit from the project, how they will benefit, and how the Project will benefit the County and the overall community.

The proposed improvement Projects-Minnieville Road from Route 234 to Spriggs Road and Route 1 from Blackburn Drive to Featherstone Road will generate numerous benefits to Prince William County, to the various stakeholders along the improvements including the residents of the local communities, to the commuters and businesses in the County, and to the Commonwealth of Virginia. The Projects are also consistent with the Prince William County Comprehensive Plan. More importantly, the Projects will have an impact to the mobility in the County upon completion. Some of the specific benefits of the Project are as follows:

Community Benefits

The implementation of the improvements will result in significant community benefits including:

- Providing wider safer and more reliable roadways;
- Improved commuting and emergency response times due to increased roadway capacity;
- Additional economic development and redevelopment opportunities in Prince William County;
- Congestion relief by providing more throughput;
- Environmental benefits due to the reduced congestion induced vehicle emissions; and
- Improved Connectivity.

Finally, the proposed improvements to Route 1 and Minnieville Road Projects satisfy the County's long-range vision for transportation improvements in the area and delivers on the County's 2006 Road Bond Referendum where funds were approved by voters in Prince William County to improve important county roadways. THE PROPOSED IMPROVEMENTS ARE CONSISTENT WITH THE PRINCE WILLIAM COMPREHENSIVE PLAN AND WILL INTEGRATE WITH VIRGINIA DEPARTMENT OF TRANSPORTATION ROADWAY IMPROVEMENT PROJECTS IN THE AREA.

Benefits to the Taxpayers of Prince William County

Delivery of the Projects under the Public Private Transportation Act (PPTA) also provides a number of benefits to the taxpayers of Prince William County. Under conventional construction mechanisms, the proposed construction would take place in the traditional design-bid-build method of procurement. Shirley D/B's proposal accelerates the completion of these important transportation improvements, delivering the Projects quicker and more efficiently than a traditional procurement would.

Shirley D/B's proposal provides many other benefits to the residents of the County including:

ONE OF THE MOST IMPORTANT AND DIRECT BENEFITS FROM THE **PPTA** PROCESS IS THAT RISKS, NOT ONLY PRICE AND SCHEDULE, BUT ALSO OVERSIGHT AND PROJECT COORDINATION RISKS, ARE SHIFTED FROM THE COUNTY TO THE **P**ROJECT TEAM. **SHIFTING OF RISK** – One of the most important and direct benefits from the PPTA process is that risk, not only to the price and schedule, but also oversight and project coordination risks, are shifted from the County to the Project Team. Although the County retains certain responsibilities that cannot be economically addressed by the private sector, others are specifically assumed by the private sector, thus allowing the county to focus its resources on other transportation priorities. Further, the risks of inflation are transferred from the County to the Project Team via a fixed price for the Project. Shirley D/B is well qualified to manage project risks through our experience on previous PPTA projects.

BENEFITS DUE TO IMPROVED SAFETY AND LESS CONGESTION – The single most important aspect of our Team's proposal is the improvement to driver safety and improved traffic flow resulting from the Project improvements. The Projects will assist in relieving overall congestion and provide commuters with wider and improved roadways along each of the Projects. The improvements will reduce accidents, lower travel times between destinations and promote safer driving conditions.

ECONOMIC DEVELOPMENT BENEFITS – The improved access and mobility resulting from the Projects can create economic development opportunities throughout the affected corridors and increase mobility for those who use the roadways for work and leisure, in addition to providing for the efficient movement of goods throughout the area. While the area along the project limits of the Minnieville Road project is essentially residential in nature, the Route 1 improvements will impact an area of significant commercial development whereby the potential for greater economic development will be more significant.

It is also anticipated that by making the roads safer and reducing congestion, commerce along the corridors will be more efficient, thus resulting in significant savings to the everyday commercial motorists. The improved traffic flow will enable common carriers to reach their destinations in less time, reducing the costs associated with moving goods. Safer traveling conditions will also result in lowering the costs of doing business.

Prince William County Transportation Benefits

By electing to utilize the PPTA mechanism for project delivery, Prince William County will meet the needs of roadway users in developing commercial and residential areas of the County. In addition, Prince William County will expedite the completion of two of the County's important regional roadways as identified in the County's Comprehensive Plan.

Additional specific transportation benefits to Prince William County include:

- **EXPEDITED DELIVERY** The innovative design and construction processes to be utilized by our Team will allow the Projects to be completed significantly ahead of the current schedule for completing the transportation improvements.
- **CONSISTENT WITH PRINCE WILLIAM COUNTY'S PLANS -** Shirley D/B's proposal is consistent with the Prince William County Comprehensive Plan for the proposed improvement Projects.
- ENVIRONMENTAL BENEFITS By reducing congestion and reducing the time that people spend idling in their cars due to recurring congestion, accidents and other traffic incidents and environmental benefits will be realized through the reduction of vehicle emissions. This will in turn assist in the improvement of the region's air quality.

The innovative design and construction processes to be utilized by our Team will allow the Project to be completed significantly ahead of the current schedules for completing these important transportation improvements. 4b. Identify any anticipated public support or opposition, as well as any anticipated government support or opposition (including that in any affected jurisdiction), for the project.

Community and Government Support

Our Team believes that residents, businesses and commuters who will ultimately use Minnieville Road and Route 1 will support the proposed Projects. Providing new roadways will increase accessibility and improve travel times. The Projects will have the support of local residents, landowners, commuters, and businesses. Taxpayers of Prince William County support the Projects as indicated in the voter approved Road Bond Referendum from 2006, the primary purpose of which was to improve important roadways in Prince William County. It is safe to assume that County residents and businesses want to see the improvements implemented as quickly as possible.

With any roadway improvement project there will always be some opposition, however we anticipate minimal opposition to the Projects. We anticipate that local residents and commuters will support the Projects as they will shorten commute times and will enhance mobility in the area. We have found that effective communication with the public can limit opposition to construction projects. As part of our project involvement effort, we will effectively communicate with the public in order to keep communities informed, provide a forum for questions and concerns and ultimately develop support for the Projects. This effort will begin at the start of the Projects and will continue until the improvements are completed and the roads are open and available for public use.

As part of our project involvement effort, we will effectively communicate with the public in order to keep communities informed, provide a forum for questions and concerns and ultimately develop support for the Projects. 4c. Explain the strategy and plans, including the anticipated timeline that will be carried out to involve and inform the general public, business community, and governmental agencies in areas affected by the project.

As stated earlier, the Project improvements are important to the residents and commuters of Prince William County. These improvements are part of the County's Comprehensive Plan for addressing congestion and improving safety and mobility.

As the Projects moves forward, our Team will work closely with Prince William County to keep local residents, landowners, businesses and the general public informed of the status of the Projects and the schedule for delivering these improvements. Our Team will implement a public involvement strategy designed to provide information to all project stakeholders in a timely manner ensuring the general public understands the project process. We have demonstrated experience in successfully implementing public involvement strategies on other design-build and PPTA projects and will bring that past experience to these Projects.

Our experienced Team will provide a public involvement process that includes:

- Notification of scheduled public information meetings hosted by the Team in conjunction with Prince William County. Our Team will host the meeting and provide the general public with notice of the meetings;
- Notification and hosting of any public hearings that may be required as part of the Project's approval process;
- Publication and distribution of a project newsletter to all impacted and interested parties designed to keep project stakeholders apprised of important project information and progress;
- Design, implementation and hosting of a project website for all project information as well as a portal for stakeholder questions about the Projects; and
- Project presentations as necessary to respond and meet with all interested community/business groups and provide information on the Projects upon request.

OUR TEAM WILL IMPLEMENT A PUBLIC INVOLVEMENT STRATEGY DESIGNED TO PROVIDE INFORMATION TO ALL PROJECT STAKEHOLDERS IN A TIMELY MANNER ENSURING THE GENERAL PUBLIC UNDERSTANDS THE PROJECT PROCESS.



Public Information Meeting

Once our Team is selected by Prince William County to implement the proposed Projects, we will schedule a public information meeting for each of the Projects. The purpose of these meetings will be to:

- Inform the public of the status of all project details, i.e., roadway designs, proffers, project schedule, etc.
- Provide information regarding right-of-way acquisition and address special needs of impacted property owners.
- Address any specific concerns and solicit input from the general public regarding the Projects and the proposed process.

The public meetings will be open to all interested parties and the Team will coordinate with Prince William County to schedule the meetings to provide adequate advance notice and to select a location that is central to the Projects, ensuring the maximum opportunity for public involvement. At the meetings, our Team will provide large scale display drawings of the proposed transportation improvements. In addition, we will provide contact names and phone numbers for project personnel, describe the project process and phases of construction, answer questions from meeting attendees, provide the proposed schedule and ensure the public is thoroughly briefed on the Projects.

Public Hearing

If required as part of the project process, our Team will host a public hearing for the Projects. Typically at a public hearing, our Team would present the same information that was available at the public meeting and the Team will be in a position to have resolved any unanswered questions from the meeting. We anticipate strong public support for the Projects and would expect any public meetings related to the Projects to receive significant attendance by the public.

Additional Public Information

As part of our community outreach program, the Team will setup and host a website for each project. Our Team has demonstrated experience in hosting a project website as was done for our the PPTA Route 28 Corridor Improvements Project for the Virginia Department of Transportation. That project website remains active and can be viewed at www.28freeway.com. Our Team's experience with setting up a project website will be a key aid in the public information process. We envision including project progress photos, project schedule information, traffic alerts and an area for concerned citizens to ask questions and receive responses via e-mail.

Also, as mentioned previously, our Team will produce and distribute a newsletter for the Projects. Similar to the information provided on our website, the newsletter will be available to the public as another means of disseminating project information. If chosen as your partners, we will coordinate all public relations information being placed on the website with the County to ensure a cohesive and coordinated message. At the interest of the County, we can also combine or link this project website to the County website in order to consolidate all information in one location.

Requests for Information

Upon request, our Team will make arrangements to meet with organized community or business groups to provide project information. We recognize that even though a significant community outreach program is available, not everyone is available to attend these informational meetings. If asked, our Team will send representatives from the Project Team to meet with groups requesting informational meetings.



OurTeam is currently utilizing a website for public information on the Route 28 Corridor Improvements Project for the Virginia Department of Transportation (http:// www.28freeway.com). 4d. Describe any anticipated significant benefits to the community and the County, including anticipated benefits to the economic, social, environmental, transportation, etc., condition of the County, and whether the project is critical to attracting or maintaining competitive industries and businesses to the County.

A STRONG INFRASTRUCTURE SYSTEM PROMOTES ECONOMIC GROWTH AND THE IMPROVEMENTS TO THESE TWO ROADWAYS WILL PROVIDE BENEFITS TO THE REGION FOR YEARS TO COME.

The Projects will provide significant benefits to the local community as well as the region and the state. A strong infrastructure system promotes economic growth and the improvements to these two roadways will provide benefits to the region for years to come.

Community Benefits-Financial

The Projects will provide financial benefits to the community by creating operational economies and providing a much needed improvement to these transportation facilities. The Projects will result in improved travel times, translating into less time spent in traffic, improved safety, and enhanced emergency response times.

Economic Benefits-Community/State/Region

The Projects will generate a host of economic benefits to the local community. The proposed improvements will enhance existing and future development in the County. The public will be provided with improved access to commercial, retail, employment and residential areas and will enjoy a transportation network with enhanced traffic flow, increased capacity and throughput. Improved access to the region will encourage existing businesses to expand and will attract potential new businesses, resulting in an increase in the tax base, benefiting all residents of the County.

Other County Goals-Benefits

The ability to move goods, services, and people in and out of a region is critical to the region's economic vitality. This ability is reliant upon the presence of an efficient transportation infrastructure. By constructing the Projects, it will provide economic growth opportunities to the region's business base and to its residents. Increased economic opportunities attract investment that in turn provides job creation, ultimately resulting in increased state revenues. As revenues increase, the state can maintain the level of service that residents and businesses have come to expect and enjoy in Prince William County. 4e. Compatibility with the County's and/or affected jurisdiction's local comprehensive plan (including related environmental, land use and facility standards ordinances, where applicable), infrastructure development plans, transportation plans, the capital improvements plan and the capital budget or other government spending plan.

The proposed improvements are consistent with the Prince William County Comprehensive Plan. All design and construction will be performed in accordance with Prince William County and Virginia Department of Transportation Standards.



8435 Backlick Road Lorton, Virginia 22079 (T) 703-550-8100 (F) 703-550-7897

September 26, 2011

Mr. Steven A. Solomon Director of Finance Prince William County 1 County Complex Court Prince William, Virginia 22192

RE: Public-Private Transportation Act Conceptual Proposal Minnieville Road and Route 1 Improvements Competing PPTA Proposal **Freedom of Information Act Request**

Dear Mr. Solomon:

Shirley Design/Build, LLC (Shirley D/B) is pleased to submit our competing conceptual proposal for the Minnieville Road and Route 1 Improvements Projects (the Projects). In accordance with the Virginia Freedom of Information Act (FOIA) Section 2.2-3705 A 56, Shirley D/B would like to request that Section 3, Project Financing be kept confidential in its entirety. It is our contention and belief that this section and the financial statements for Shirley Contracting Company, LLC accompanying Section 3, represent proprietary and confidential information to our business.

Thank you for your consideration in this matter. Should you have any questions, please feel free to contact me at 703-55-3579 or gpalleschi@shirleycontracting.com. We look forward to working with you in advancing these Projects.

Sincerely,

Garry A. Palleschi Vice President Shirley Design/Build, LLC