

City of Portsmouth
Portsmouth, New Hampshire
Department of Public Works

**ENGINEERING AND DESIGN SERVICES FOR
I-95 EXIT 7 (MARKET STREET) INTERCHANGE IMPROVEMENTS
And Traffic Signal Upgrade Project**

REQUEST FOR PROPOSAL

Sealed Proposals, plainly marked RFP # 09-07, "Engineering Services, I-95 Exit 7 (Market Street) Interchange Improvements" on the outside of the mailing envelope, addressed to the Finance/Purchasing Department, City Hall, 1 Junkins Avenue, Portsmouth, NH 03801 will be accepted until 1:30 p.m. on Thursday, August 31, 2006.

SCOPE OF WORK: The City of Portsmouth's Department of Public Works invites sealed proposals for professional engineering services related to design of the I-95 Exit 7 (Market Street) interchange improvements, as well as signal upgrades at the I-95 northbound and southbound intersections with Market Street. Proposals must present evidence of the firm's qualifications and experience with designs of similar roadways, drainage and signal modifications.

Request for Proposal may be obtained from the Finance/Purchasing Department on the third floor of City Hall 1 Junkins Ave, Portsmouth, New Hampshire or on the City's web site at www.CityofPortsmouth.com, or by calling the Purchasing Clerk at 603-610-7227. **Please continue below for the complete Request for Proposal.**

The City of Portsmouth reserves the right to reject any or all proposals, to waive technical or legal deficiencies, and to accept any proposal that it may deem to be in the best interest of the City.

If you have any questions please contact the Purchasing Clerk at 603- 610-7227 or Deborah Finnigan, PE at 603- 766-1415.

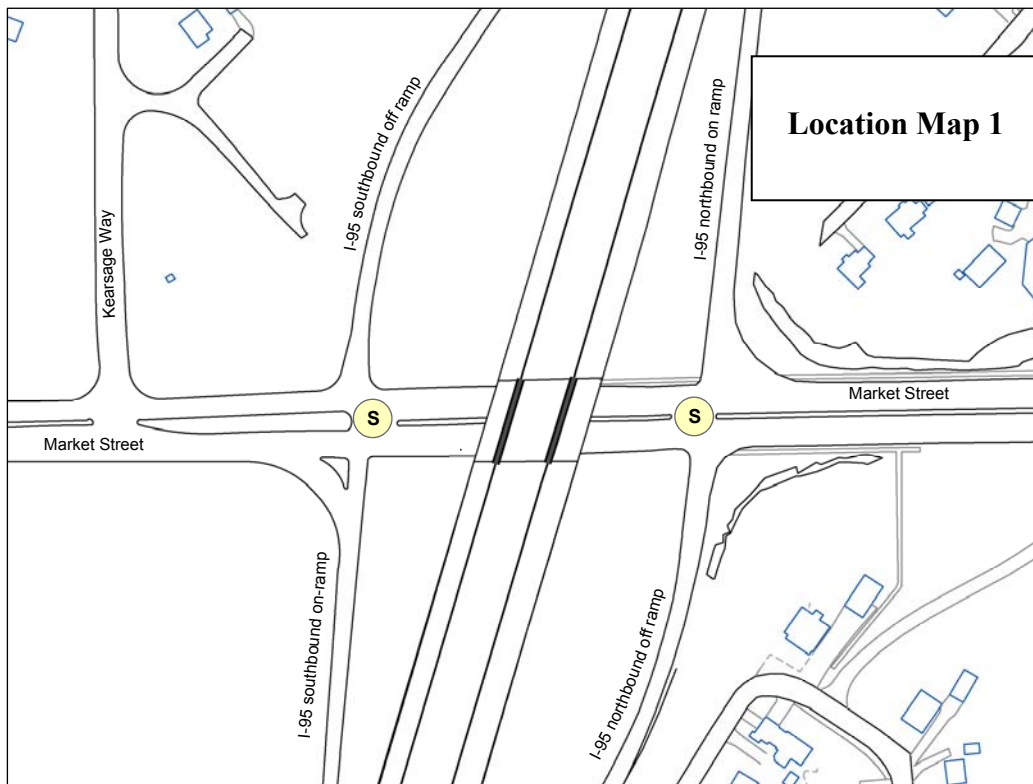
REQUEST FOR PROPOSAL FOR ENGINEERING AND DESIGN SERVICES

I-95 EXIT 7 (MARKET STREET) INTERCHANGE IMPROVEMENTS

I: Introduction

The City of Portsmouth seeks proposals from qualified consulting firms for engineering design services to improve the I-95 Exit 7 (Market Street) interchange capacity and upgrade two traffic signals (shown on Location Map 1).

The City of Portsmouth will manage the project through the NHDOT's Municipally Managed Program. The program allows the City to select the design consultant and contractor, provide contract administration, coordinate public participation efforts and manage the design and construction of the project. It is the City's intent to begin construction in April 2007.



II: Purpose and Need

The I-95 Exit 7 (Market Street) Interchange creates direct access to the City's downtown business district and historical areas from Interstate 95, as well as to other corridor businesses and residences. The

interchange project area is from the Intersection of Market Street and Kearsarge Way to 200' east of the I-95 Northbound on-ramp at Market Street.

The Interstate 95 and the Market Street/Woodbury Avenue corridor has experienced a large increase in traffic in the recent years. The capacity of the I-95 (Exit 7) Market Street interchange has been insufficient to handle existing traffic demands. The interchange capacity constraints cause vehicles to queue back to Kearsarge Way blocking vehicles trying to exit Kearsarge Way and vehicles will violate the red phase by “running” the signal, so they don’t have to wait through another cycle of the signal. The interchange operations will continue to degrade and cause continued safety problems, because of additional corridor development and traffic growth. Therefore, timing changes and capacity improvements will help facilitate traffic moving more efficiently in this area.

Improving Interchange Capacity

The project will include adding additional turn lanes on Market Street and by adding travel lanes to the I-95 southbound off-ramp and the I-95 northbound on-ramp. This work also includes reducing the existing median island width, striping, widening of Market Street and the ramps, relocation of existing sidewalk, minor traffic signal equipment modifications (including adding a phase to the I-95 northbound ramps at market Street) and minor drainage modifications.

The Market Street Extension Corridor is one of the City’s main arteries for moving traffic to and from the Central Business District and the Woodbury Avenue corridor from Interstate 95 and because of the close proximity of traffic signals in the corridor, vehicles will sometimes back up from one intersection through the next.

Improving Transportation Efficiency

For the last several years, this corridor has seen a 3% growth in traffic. Therefore, a major objective of this project is to significantly reduce travel delay and unnecessary stopping within the corridor for the motoring public.

Improving Safety

The only way access or egress from the Atlantic Heights development is via Kearsarge Way, so when queuing occurs because vehicles trying to access the interstate the development becomes land-locked. This is a concern to the residents as well as a safety concern for emergency vehicles.

Signal Pre-emption for Emergency Vehicles

The City is in the process of upgrading its signals citywide with emergency signal pre-emption systems. Therefore the system will need to be equipped with such a system.

III: Coordination with Other City Projects

The City is in the process of upgrading infrastructure in the corridor. The following projects are planned:

Bicycle and Pedestrian Facilities from NH Port Authority to Michael Succi Drive on Market Street.

The project will provide safe bicycle and pedestrian facilities along Market Street that connect downtown to neighborhood and commercial areas located west of I-95 Exit 7 interchange.

III: Scope of Work

The project area is from the Intersection of Market Street and Kearsarge Way to 200' east of the I-95 Northbound on-ramp at Market Street. There is a preliminary report that will be available for the design work.

1. BASE PLAN PREPARATION:

A ground survey will be required from the intersection of Kearsarge Way at Market Street to a point on Market Street approximately 450' east of the I-95 Northbound on-ramp. The amount of survey coverage for the on and off ramps is as follows: approximately 550' on the southbound off-ramp, approximately 600' to 1000' on the northbound on-ramp, and the southbound on-ramp and the northbound off-ramp shall have at least 100' of survey coverage. Base plans will be prepared at 20-scale for the corridor, including, but not limited to right-of-way, elevation contours, drainage and sewer structures, utilities, traffic signs, retaining walls, buildings, curbing, driveways, pavement markings, signal equipment, and other major features. If capacity improvements, (i.e. widening for turn lane) are needed to achieve the full benefits of coordination, cross-sections will be required at a maximum of every 50 feet along the alignment; cross-section data will include all existing features.

2. PRELIMINARY DESIGN:

The consultant will develop preliminary design plans for City of Portsmouth approval prior to proceeding to final design. The preliminary plans will include, but not be limited to:

- Location plan
- General plan with survey detail and contours
- Profile as needed
- Typical section
- Cross sections as needed
- Critical cross sections as needed
- Utility plan, if required
- R.O.W., alignment and Curb Ties as needed
- Pavement Markings and Signage
- Signalization and Coordination Plan
- Documentation of proposed variance from minimum city, state or federal design standards, (if applicable)
- Itemized cost estimate using, to the maximum extent practical, item numbers, nomenclature, descriptions, materials and construction requirements that are contained in the Standard Specifications for Road and Bridge Construction, State of NHDOT latest edition. Method of measurement and basis of payment for items used may be modified by Special Provision at the discretion of the designer. Special items unique to the project will require their own Special Provisions.

Original construction plans and one set of reproducible polyester film plans will become the property of the City of Portsmouth. A professional engineer licensed in the State of New Hampshire will stamp all

plans. The consultant will also provide the City with electronic files containing all engineering data in AutoCAD format.

3. ENVIRONMENTAL & CULTURAL DOCUMENTATION:

The Consultant will be responsible for identifying the project's impacts on the environment. Existing natural, cultural, and social resources will be reviewed and documented by the consultant as described in the latest version of the *State of New Hampshire Department of Transportation's Congestion Mitigation and Air Quality & Transportation Enhancement Projects Manual for the Development of Projects*. It is anticipated that the type of environmental document required for this project will be a Categorical Exclusion (CE).

Since the project is federally funded, Section 4(f) of the USDOT Act and Section 106 of the National Historic Preservation Act will allow the NH Division of Historical Resources (NHDHR)/State Historic Preservation Office (SHPO) the opportunity to review the project's impacts on potentially sensitive historic and cultural resources. The Consultant will be responsible for conducting a preliminary review to identify potentially historic and archaeological resources in the project area. The results of these findings and any recommendations from NHDHR will be properly documented.

The consultant may be required to prepare air quality or noise modeling to determine the project's impact on adjacent receptors. The results of these modeling sessions will be stated in the environmental document, if needed.

A review of NH Department of Environmental Services (NHDES) files and a cursory review of the project site should be conducted by the consultant to determine whether any potentially hazardous materials are present within the project area. The Consultant will document these findings.

The Consultant will be responsible for preparing all applications and obtaining all pertinent environmental permits or approvals on behalf of the City.

4. MEETINGS:

It is assumed that eleven (11) meetings will require the consultant's attendance as provided below. The Consultant shall be responsible for recording and preparing meeting agendas and minutes as well as providing presentation plans as requested by the City.

- Progress Meetings with City Staff (Assume 5 meetings)
- Public Informational Meeting (Assume 1)
- Environmental Resource Meeting (Assume 1)
- Abutters Meeting (Assume 1)
- Utility Coordination Meeting (Assume 1)
- Pre-Bid meeting with City/ Prospective Contractors (Assume 1)
- Pre-Bid meeting with Abutters (Assume 1)

5. FINAL DESIGN:

Following the preliminary plan presentation, the Consultant will prepare final design plans, specifications, and an estimate for City review and approval. The final design plans will consist of two separate design review submissions:

- Preliminary PS&E
- Final PS&E

The Final PS&E submission shall include a Preliminary Traffic Control Plan and Prosecution of Work for discussion with the City. Each submission shall include a list of the project items and descriptions of variances from the minimum City design standards. Following the review of the Final PS&E submission, the Consultant shall make any minor revisions and submit a vellum copy of the plans with a copy of the calculations, as well as, PDF files and CADD files for each drawing and any construction documentation, which shall be stamped by a Professional Engineer in the State of New Hampshire for use in construction bidding. All design computation sheets and plans shall also be submitted in electronic format for the City's future use.

6. CONSTRUCTION SERVICES:

- A. *Construction Layout* - The Consultant shall provide construction layout services. This price will represent completion of this task one time only.
- B. *Traffic Signal System Fine-Tuning and Adjustment in Field* – Following construction, the Consultant shall provide engineering and technical personnel to fine-tune and adjust the system equipment and signal timings in the field. A check and review of the traffic operations plans shall be field documented to assure that the proper operations are implemented.

IV: Submittal Requirements

The Consultant shall submit three (3) bound copies of a non-price proposal and one (1) separate sealed original price proposal that includes a lump sum fee for design services to complete the scope of work. **Proposals will be accepted until Thursday, August 31, 2006 at 1:30 p.m. at the Finance/Purchasing Department, City Hall, 1 Junkins Avenue, Portsmouth, New Hampshire, 03801.**

The following items shall be included in the non-price proposal submission.

1. Firm Description – provide a brief description of the firm including firm size and areas of specialization, location of corporate headquarters, and potential satellite office proposed to handle this project.
2. Project Team – Provide names and resumes of key professional staff who would be assigned to the project. Each team member's education and experience shall be listed. The team leader shall be designated.
3. Relevant Experience – Provide the details of relevant experience and past performance of the consultant and its team members on comparable roadway interchange projects with signal

modifications. This item should cover, at a minimum, the substantive nature of comparable projects. Consultants are required to give sufficient information of their experiences to permit the City to understand and verify the exact nature of the contributions made by the Consultant to the projects listed.

4. References – Provide the name, title, locations and phone number of persons who can substantiate the consultant’s referenced experiences as listed in Item #3 above.
5. Statement of Project Requirements – The consultant shall state in succinct terms its understanding of what is required by this Request for Proposal.
6. Scope of Services – Describe in narrative form the Consultant’s approach and technical plan for accomplishing the work listed herein. The Consultant is encouraged to elaborate and improve on the tasks listed in the RFP. The Consultant shall submit a schedule for completing the scope of work, based on a construction advertising date of *November 30, 2006*.
7. Costs – The consultant shall submit in a separate sealed envelope a price required to complete the services described in the proposal. The fee schedule should be broken down by proposed task including labor, overhead, profit and reimbursable expenses. A cover letter must be included which is signed by an authorized owner or agent of the firm, committing the firm’s resources to complete the project on time and within the fee.
8. Insurance

The Consultant shall purchase and maintain, for the duration of the contract, insurance of limits and types specified below from an insurance company approved by the City, in addition to the following:

The Consultant will indemnify the City against all suits, claims, judgements, awards, loss, cost or expense (including without limitation attorney fees) arising in any way out of the Consultant’s performance or non-performance of its obligations under this Contract. Contractor will defend all such actions with counsel satisfactory to the City at its own expense, including attorney’s fees, and will satisfy any judgement rendered against the City in such action.

Additionally Insured

All liability policies shall include the City of Portsmouth, NH as named Additional Insured.

- 1) The Consultant’s insurance shall be primary in the event of a loss.
- 2) The Additional Insured endorsement must include language specifically stating that the entity is to be covered for all activities performed by, or on behalf of, the Consultant.
- 3) City of Portsmouth shall be listed as a Certificate Holder. The City shall be identified as follows:

City of Portsmouth
ATTN: Legal Department
1 Junkins Avenue
Portsmouth, NH 03801

Evidence of Insurance

As evidence of insurance coverage, the Owner may, in lieu of actual policies, accept official written statements from the insurance companies certifying that all the insurance policies specified below are in force for the specific period. The Consultant shall submit evidence of insurance to the Owner at the time of execution of the Agreement. Written notice shall be given to the City of Portsmouth, NH at least thirty (30) days prior to the cancellation or non-renewal of such coverage.

Forms of Insurance

Insurance shall be in such form as will protect the Consultant from all claims and liabilities for damages for bodily injury, including accidental death, and for damage, which may arise from operations under this Contract whether such operation by himself or by anyone directly or indirectly employed by him.

Amounts of Insurance

- A. Comprehensive General Liability:
Bodily Injury or Property Damage - \$1,000,000
- B. Automobile and Truck Liability:
Bodily Injury or Property Damage - \$1,000,000
- C. Professional Liability:
Errors and Omissions - \$2,000,000

Additionally, the Consultant shall purchase and maintain the following types of insurance:

Full Workers Comprehensive Insurance Coverage for all people employed by the Consultant to perform work on this project. The insurance shall be in strict accordance with the requirements of the most current laws of the State of New Hampshire.

V: Selection Criteria

All responsive submittals shall be reviewed and the City may conduct interviews of short-listed firms. Each team shall be evaluated based on the following criteria:

- A. Team Qualifications
- B. Qualifications of Project Manager, Lead Designers, and other Key Staff
- C. Understanding of Project Objectives
- D. Responsiveness to City's Requirements reflected in Proposed Approach/Scope
- E. Adherence to Project Schedule

Upon review of the non-price proposals and after conducting interviews, if so used, the City shall rate the firms in order of preference. The top rated firm shall be notified of its standing and negotiations with the City shall commence. If the City is unsuccessful in reaching a satisfactory contract fee with the top rated firm, it may terminate the negotiations without prejudice and commence negotiations with the second

rated firm. If no agreement can be reached with the second rated firm, the City shall move to the third, and so forth. Once negotiations are terminated with a firm, they may not be reopened.

The City of Portsmouth reserves the right to reject any and all proposals, to waive technical or legal deficiencies, and to accept any proposals that are deemed to be in the best interest of the City, and to negotiate terms and conditions of any proposal leading to acceptance and final execution of a contract.