

CITY OF NEWPORT, RHODE ISLAND  
PURCHASING DIVISION  
NOTICE TO BIDDERS

**SEALED BID/PROPOSAL**  
**#13-050**

Sealed Bids/Proposals are being requested to provide **Roadway Improvements**, in accordance with all terms and specifications contained herein, will be received in the Purchasing Office, City Hall, 43 Broadway, Newport, R. I., until:

**Two (2:00) P.M., Local Time 8 May 2013**  
at which time they will be publicly opened and read.

There will not be a pre-bid conference for this bid package. For more information about the project or its intent please contact **Eric J. Earls, PE, City Engineer, at (401) 845-5842.**

The Contractor shall submit **two copies** (one of these copies shall satisfy R.I. Gen. Law §37-2-18(j), referenced below) of the Bids/Proposals in sealed envelopes addressed to the Purchasing Office, City Hall, 43 Broadway, Newport, R.I. 02840, and must be plainly marked in the lower left hand corner, **"Roadway Improvement Program 2013 #13-050"**. **The City requests that each bidder provide one (1) electronic copy on a CD with your hardcopy submittal.**

We encourage all bidders to read the entire bid package to fully understand the scope of the project and the requirements set forth by the City. Each Bidder must submit, at a minimum, the completed proposal pages; including the acknowledgement of addendum, unit bid prices, questionnaire, corporate information page and a certified check or proposal bond in the amount of five percent (5%) of the total bid amount, satisfactory to and payable to the order of the City of Newport, RI. **Failure to submit all required documentation may result in disqualification of the bid.**

Per R.I. Gen. Laws §37-2-18(j), Effective January 1, 2013, any bid or proposal that exceeds Five Hundred Thousand (\$500,000) dollars must include a copy to be available for public inspection upon the opening of the bids. **Any bid or proposal in excess of Five Hundred Thousand (\$500,000) dollars which does not include a copy for public inspection shall be deemed to be non-responsive.**

Note: Bid Tabulations will be posted on the City of Newport website generally within twenty-four (24) hours of the closing date. The bid tabulation area is located at [www.cityofnewport.com](http://www.cityofnewport.com) under purchasing. The tabs are listed by bid number.

It is the bidder's responsibility to see that the bid is delivered within the time and at the place prescribed. Bids received prior to the time of opening will be securely kept, unopened. Bids may be withdrawn on written request (on the letterhead of the bidder and signed by the person signing the bid) which must be received prior to the time fixed for opening. Bids may be modified in the same manner. No bid or modification thereof received after the time set for opening will be considered, even if it is determined by the City that such non-arrival before the

time set for opening was due solely to the delay in the mails for which the bidder is not responsible.

Any bidder taking exception to, or questioning any of the provisions, procedures, conditions or specifications herein stated should make such exceptions known to the undersigned, in writing, not less than five (5) days before the bid opening.

Any change or interpretation made as a result thereof will be published in an addendum and mailed to all prospective bidders. Should a bidder still not be satisfied, he may, in the bid, set out and stipulate the exception, with enough explanation to be understood by the City and, within the stipulation, the INCREASE or DECREASE in the bid price because of the exception shall be stated. The City may, at its discretion, accept or reject any or all exceptions.

Federal Excise Taxes and/or Rhode Island Use Taxes are not to be included in the bid. The City will execute exemption certificates if furnished by the bidder when submitting his invoice.

The bidder will state the approximate delivery date in the bid, or the time required to make delivery after notification of award.

The right is reserved, as the interest of the City may require, to reject any or all bid proposals, to waive any technical defect or informality in bids received, and to accept or reject any bid or portion thereof. The City of Newport reserves the right to reject any or all proposals or to accept any proposals deemed to be for the best interest of the City.

**The technical point of contact for this package is Eric J. Earls, P.E. at (401) 845-5842, email - [earls@cityofnewport.com](mailto:earls@cityofnewport.com).**

Note: All bidders are responsible for insuring that no **addenda** have been made to the original bid package. All bid packages and addenda are located at [www.cityofnewport.com](http://www.cityofnewport.com) under (Active Bids) within the Purchasing webpage using the above bid/proposal number or you can contact the Purchasing Department.

**Prevailing Wage** - Any construction over \$ 1,000.00 is required by state law to pay state prevailing wage. A current copy of the most recent Prevailing Wage scale is obtained from the State of Rhode Island, Department of Labor and Training, Division of Professional Regulation or at the Davis-Bacon Wage Determination link. It is also by request for each construction bid document. All vendors supplying construction services must submit certified payrolls from any contractor and sub-contractor who work on the project. No payments are made until all payrolls are up to date, and correct.

Prevailing Wages also applies to ALL other (Non-Construction) Requirements. If the City's requirement is sealed bid, the DAVIS-BACON Wage Determination applies.

**Buy American Act** (1933- [Sections 10 \(a-d\) of Title 41](#)) and **Buy American Act Provision** (1982 - [Section 5323\(j\) of Title 49](#)) apply to this requirement, and therefore, documentation may be requested in support.

CITY OF NEWPORT, RHODE ISLAND  
Erin Mulligan, Purchasing Agent  
(401) 845-5414

## GENERAL CONDITIONS

1. The City reserves the right to reject any and all proposals, to waive any informality, to request interviews of Service Providers prior to award and to select and negotiate the Service Provider services in the best interest of the City.
2. The Service Provider shall guarantee to perform the services offered and the total price of the proposal for a period of not less than 60 days from the deadline for submission of proposals.
3. The City reserves the right to accept all or part of any proposal, and to negotiate a contract for services and cost with the selected Service Provider.
4. The Service Provider shall provide all necessary personnel, materials and equipment to perform and complete all work under this proposal.
5. All original documents and drawings shall become the property of the City after completion of the Service Provider's work.
6. The City of Newport intends to recommend award of a contract to the City Council for the requested services within one (1) month of receipt of the proposals. The Service Provider shall be prepared to commence work immediately upon execution of a contract with the City.
7. Awards will not be made to any person, firm or company in default of a contract with the City, the State of Rhode Island or the Federal Government.
8. The Service Provider hereby agrees that it will assign to the City of Newport all cause of action that it may acquire under the anti-trust laws of Rhode Island and the United States as the result of conspiracies, combination of contracts in restraint of trade which affect the price of goods or services obtained by the City under this contract if so requested by the City of Newport.
9. Unless otherwise stated, invoices are to be submitted (to Accounting Office) in duplicate upon delivery of service to the City. The invoice must include an itemization of all services provided, including unit list price, net price, extensions and total amount(s) due.
10. Unless otherwise stated, payment will be made within thirty (30) days of the completion of the service, in an acceptable fashion, to the City and receipt of invoice, whichever is later.
11. City is exempt from all sales and Federal excise taxes. Our exemption number is 05-6000-260. Please bill less these taxes.
12. The City of Newport's obligations to pay any amount due under a contract are contingent upon availability and continuation of funds for the purpose. The City may terminate the contract, for non-appropriation of funds, and all payment obligations of the City cease on the date of termination.
13. None of the services covered by the contract shall be assigned in full or in part, or sub-contracted without the prior approval of the City.
14. This contract will be for the services described above; however, this agreement should not be considered exclusive. As deemed necessary, the City reserves the right to obtain these services from any other vendor.
15. Unless otherwise specified all costs listed are firm for the term of the contract.
16. Neither party shall be liable for any inability to perform its' obligations under any subsequent agreement due to war, riot, insurrection, civil commotion, fire, flood, earthquake, storm or other act of God.
17. Notification of the parties shall be considered to have been constructively received when it is mailed via the United States Postal Service or delivered in hand to the parties as stated in the contract.

18. If any of the GENERAL TERMS AND CONDITIONS is held to be invalid or unenforceable, it will be construed to have the broadest interpretation which would make it valid and enforceable under such holding. Invalidity or unenforceability of a term or condition will not affect any of the other GENERAL TERMS AND CONDITIONS.
19. Each and every provision and clause required by law to be inserted in any subsequent Contract shall be deemed to be inserted herein and the Contract shall be read and enforced as though it were included herein, and if through mistake or otherwise any such provision is not inserted, or is not correctly inserted, then upon the application of either party, the Contract shall forthwith be physically amended to make such insertion or correction.
20. Proposal shall also mean quotation, bid, offer, qualification/experience statement, and services. Proposers shall also mean vendors, offerors, bidders, or any person or firm responding to a Request for Proposals.
21. All contracts entered into by the City of Newport shall be governed by the Laws of the State of Rhode Island. Any disputes shall be resolved within the venue of the State of Rhode Island and Newport County.
22. The Service Provider selected for this project shall procure and maintain the following types of insurance:
  - Statutory Workers Compensation and Employer's Liability Insurance
  - Professional Services Liability Insurance for errors and omissions (\$1,000,000.00 minimum)
  - Liability and Property Damage Insurance (a) Bodily injury liability: \$500,000 each person, \$1,000,000 each occurrence; (b) Property damage liability: \$500,000 each occurrence, \$1,000,000 aggregate.

## INFORMATION FOR BIDDERS

### 1. PROPOSALS RECEIVED

The City of Newport, Rhode Island, through its Purchasing Division (hereinafter called the Owner), will receive proposals for **Roadway Improvement Program 2013** and appurtenant works at the time and place and under the conditions stated in the Notice to Bidders.

### 2. WORK INCLUDED

The Contractor shall furnish all labor, materials, tools and equipment necessary to for permanently restoring the specified roadways and sidewalks and to perform the work of these Contract Documents and all included Items, their associated Specifications and Details under the direction of the City. Construction items are identified within the Detailed Specifications. The location of work shall vary throughout the City of Newport. Areas designated for reconstruction under this Contract are indicated in the Appendix. All terms and prices shall remain in effect throughout the term of Agreement.

Items of work and approximate quantities included in this contract can be found in the Proposal Pages of this document.

The Contractor shall be responsible for coordinating leak detection with the Department of Utilities, Water Division prior to installing the top course of asphalt. Department of Utilities, Water Division can be reached at (401) 845-5600.

**NOTE: Work associated with Warner Avenue is being funded by Community Development Block Grant (CDBG) funds.** As such, the contractor will be required to submit separate itemized invoices for work associated with this roadway. Additionally, the contractor's work force will be required to submit to brief interviews while working on this roadway by City staff. The Contractor may also be required to submit additional documentation associated with the work within the scope of the CDBG defined roadways. No additional payment will be made for these requirements. Payment for these roadways will not be issued until all required documentation has been collected for each roadway as approved and accepted by City staff.

The Contractor shall take special care during construction to maintain and keep the roadway passable at the end of each day during construction and at all times for emergency vehicles. All driveways must be accessible at the end of each day.

Traffic shall be adequately controlled by the Contractor; however, the City Engineer shall identify the need and schedule for all police details throughout the project. Police details shall be paid by the City.

### 3. PROPOSAL

Each proposal must be made upon forms contained herein. The proposal, as submitted, shall not be separated from the volume containing the other contract documents that are bound with it. The blank spaces in the proposal must be filled in correctly where indicated for each and every item, and the bidder must state, both in words and in numerals, written or printed in ink, the prices for which he proposes to do each item of

the work contemplated. In case of discrepancy between the words and the numerals, the words shall govern. Ditto marks are not considered writing or printing and shall not be used. The bidder shall sign his proposal correctly. If the proposal is made by an individual, his name and post office address must be shown. If made by a firm, partnership, or corporation, the proposal must be signed by an official of the firm, partnership, or corporation authorized to sign contracts, and must show also the post office address of the firm, partnership, or corporation.

**4. IRREGULAR PROPOSALS**

Proposals may be rejected if they show any omissions, alterations of form, additions not called for, conditional or alternate bids, or irregularities of any kind. Bids which are considered to be unbalanced or unreasonable as to the amount bid for any lump sum or unit price item may be rejected.

**5. COMPETENCY OF BIDDERS**

Bidders shall be experienced in the kind of work to be performed and shall have the necessary equipment therefore and sufficient capital to properly execute the work within the time allowed. Bids received from bidders who previously failed to complete contracts within the time required, or who have previously performed similar work in an unsatisfactory manner, may be rejected. A bid may be rejected if the bidder cannot show that he has the necessary plant to commence the work at the time prescribed and thereafter to prosecute and complete the work at the rate or within the time specified. It also may be rejected if he is already obligated for the performance of other work that would delay the commencement, prosecution or completion of the work. The City may make such investigations as deemed necessary to determine the ability of the bidder to perform the work, and the bidder shall furnish to the City all such information and data for this purpose as the City may request.

**6. CERTIFIED CHECK OR PROPOSAL BOND**

Each bid must be accompanied by a certified check or proposal bond in the sum of five per cent (5%) of the amount of the bid, satisfactory to and payable to the order of the City. The proposal bond (or bonds) and the surety shall be licensed or have surplus line approval to do business in the state of Rhode Island. Such checks or bonds will be returned to all except the three lowest bidders within three (3) banking days after the formal opening of bids. The checks or bonds will be returned to the three lowest bidders within five (5) days after the execution of the Contract and the furnishing of the required security by the successful bidder.

**7. PERFORMANCE AND PAYMENT BOND**

The successful bidder, at the time of the execution of the contract, must deposit with the City a surety company bond (or bonds) for the satisfactory completion of the work and the payment of all debts pertaining to materials and labor used or employed in the execution of the contract, in an amount equal to the amount of the contract award. The form of the bond (or bonds) and the surety shall be licensed or have surplus line approval to do business in the State of Rhode Island.

Prior to payment of the final estimate, the Contractor shall furnish a certificate from his surety stating that the performance bond covers the one-year defective workmanship and materials guarantee period.

**8. EXECUTION OF CONTRACT**

The party to whom the Contract is awarded or his authorized representative will be required to execute the Contract within ten (10) days (not including Sunday) from the Notice to Proceed and, in case of his failure or neglect so to do, the City may, at its option, determine that the bidder has abandoned the Contract, and thereupon the proposal and acceptance shall be null and void, and the security accompanying the proposal shall be forfeited to the City.

**9. CONTRACTOR'S INSURANCE**

The Contractor shall secure and maintain such insurance from an insurance company authorized to write casualty insurance in the State of Rhode Island as will protect himself, his sub-contractors, and the City from claims for bodily injury, death or property damage which may arise from operations under this contract. The Contractor shall not commence work under this contract until he has obtained all insurance required under this section and until he shall have filed the certificate of insurance or the certified copy of the insurance policy with the City. Each insurance policy shall contain a clause providing that it shall not be canceled by the insurance company without ten (10) days written notice to the City of intention to cancel. The amounts of such insurance shall not be less than the following:

Workmen's Compensation and Employers' Liability Insurance shall be secured and maintained as required by the State of Rhode Island.

- (a) Public Liability, Bodily Injury, and Property Damage:
  - 1. Injury or death of one person: \$ 1,000,000
  - 2. Injury to more than one person in a single accident: \$ 1,000,000
  - 3. Property damage: \$ 1,000,000

- (b) Automobile and Truck Public Liability, Bodily Injury and Property Damage:
  - 1. Injury or death of one person: \$ 1,000,000
  - 2. Injury to more than one person in a single accident: \$ 1,000,000
  - 3. Property damage: \$ 1,000,000

**10. RESPONSIBILITY OF CONTRACTOR**

Attention is directed here particularly to the provisions of the Contract and Specifications whereby the Contractor shall be responsible for any loss or damage that may happen to the work or any part thereof during its progress; and also whereby the Contractor shall make good any defects or faults that may occur within one (1) year after its completion and acceptance. He shall indemnify and save harmless the City from any damages or costs to which it may be put by reason of injury to the person or property of another resulting from negligence or carelessness in the performance of the work under this Contract.

**11. FAMILIARITY WITH THE WORK**

Bidders are required to carefully examine all Contract drawings and specifications and to make a thorough investigation of conditions at the location of the proposed work. It is the obligation of the bidder to ascertain for himself all the facts concerning conditions to be found at the location of the project, including all physical characteristics above, on and below the surface of the ground, to consider fully these and all other matters which can, in any way, affect the work under this Contract and to make necessary investigations relating thereto, and he agrees to this responsibility with respect to ascertaining for the Contractor such facts concerning physical characteristics at the site of the project. The Contractor agrees that he will make no claim for, and has no right to, additional payment or extension of time for completion of the work or any other concession because of any misinterpretation or misunderstanding on his part of this Contract or because of any failure on his part to fully acquaint himself with all conditions relating to the work.

**12. INTERPRETATIONS**

If any person contemplating submitting bids for the proposed work is in doubt as to the true meaning of any part of these proposed Contract documents, he may submit to the City a written request for an interpretation thereof. Any interpretation of such documents will be made only by addenda duly issued and a copy of each addendum will be mailed or delivered to each person receiving a set of said documents. The City will not be responsible for any other explanations or interpretations of such documents that anyone presumes to make on behalf of the City before expiration of the time set for the receipt of bids.

**13. RIGHT TO REJECT**

The City reserves the right to reject any or all proposals or to accept any bid deemed to be for its best interest.

**14. WITHDRAWAL OF PROPOSALS**

Bids may be withdrawn on written request (on the letterhead of the bidder and signed by the person signing the bid) which must be received prior to the time fixed for opening. Bids may be modified in the same manner.

**15. ESTIMATE OF WORK**

For bidding purposes, the work has been subdivided into the items identified within the proposal pages of this document. The quantities provided for the items are to be considered as approximate and are given solely for comparison of bids. The City does not expressly or by implication agree that the actual quantity shown for any item will correspond therewith and it reserves the right to increase or decrease the amount of any class or portion of the work as may be deemed necessary by the Director of Public Services.

**16. TIME FOR COMPLETING WORK**

The attention of bidders is especially directed to the time for completion of work under this Contract, which shall not exceed **November 15, 2013**.

**17. TAXES**

The bidders' attention is directed to the fact that certain taxes, including Federal excise and/or Rhode Island Use Taxes are not applicable to City work. The City will execute exemption certificates for the materials and equipment used in the work.

**18. WAGES**

The attention of bidders is called to the requirements for compliance with the applicable provisions of Rhode Island General Laws, Chapter 37-12 and 37-13. The Department of Labor determines the customary and prevailing rate of wages paid to craftsmen, teamsters, and laborers in construction of public works by the State, and by Cities, towns, and by persons contracting therewith for such construction. The latest general wage decision as determined by State Law at the time of this project shall be implemented by the Contractor for this project. The Contractor is responsible for complying with all wage laws. Attached are sections 37-13-5, 37-13-6, and 37-13-7 of the General Laws of Rhode Island as required to be inserted by Section 37-13-9. Further information may be obtained from the Office of the Department of Labor, 220 Elmwood Avenue, Providence, Rhode Island.

**TITLE 37**  
**Public Property and Works**  
**CHAPTER 37-13**

**Labor and Payment of Debts by Contractors**

**SECTION 37-13-5**

§ 37-13-5 Payment for trucking or materials furnished – Withholding of sums due. – A contractor or subcontractor on public works authorized by a proper authority shall pay any obligation or charge for trucking and material which have been furnished for the use of the contractor or subcontractor, in connection with the public works being performed by him or her, within one hundred eighty (180) days after the obligation or charge is incurred or the trucking service has been performed or the material has been delivered to the site of the work, whichever is later. When it is brought to the notice of the proper authority in a city or town, or the proper authority in the state having supervision of the contract, that the obligation or charge has not been paid by the contractor or subcontractor, the proper authority may deduct and hold for a period not exceeding sixty (60) days, from sums of money due to the contractor or subcontractor, the equivalent amount of such sums certified by a trucker or material man creditor as due him or her, as provided in this section, and which the proper authority determines is reasonable for trucking performed or materials furnished for the public works.

**SECTION 37-13-6**

§ 37-13-6 Ascertainment of prevailing rate of wages and other payments – Specification of rate in call for bids and in contract. – Before awarding any contract for public works to be done, the proper authority shall ascertain from the director of labor and training the general prevailing rate of the regular, holiday, and overtime wages paid and the general prevailing payments on behalf of employees only, to lawful welfare, pension, vacation, apprentice training, and educational funds (payments to the funds must constitute an ordinary business expense deduction for federal income tax purposes by contractors) in the city, town, village, or other appropriate political subdivision of the state in which the work is to be performed, for each craft, mechanic, teamster, laborer, or type of worker needed to execute the contract for the public works. The proper authority shall, also, specify in the call for bids for the contract and in the contract itself the general prevailing rate of the regular, holiday, and overtime wages paid and the payments on behalf of employees only, to the welfare, pension, vacation, apprentice training, and education funds existing in the locality for each craft, mechanic, teamster, laborer, or type of worker needed to execute the contract or work.

**SECTION 37-13-7**

§ 37-13-7 Specification in contract of amount and frequency of payment of wages. – (a) Every call for bids for every contract in excess of one thousand dollars (\$1,000), to which the state of Rhode Island or any political subdivision thereof is a party, for construction, alteration, and/or repair, including painting and decorating, of public buildings or public works of the state of Rhode Island or any political subdivision thereof, and which requires or involves the employment of employees, shall contain a provision stating the minimum wages to be paid various types of employees which shall be based upon the wages that will be determined by the director of labor and training to be prevailing for the corresponding types of employees employed on projects of a character similar to the contract work in the city, town, village, or other appropriate political subdivision of the state of Rhode Island in which the work is to be performed. Every contract shall contain a stipulation that the contractor or his or her subcontractor shall pay all the employees employed directly upon the site of the work,

unconditionally and not less often than once a week, and without subsequent deduction or rebate on any account, the full amounts accrued at time of payment computed at wage rates not less than those stated in the call for bids, regardless of any contractual relationships which may be alleged to exist between the contractor or subcontractor and the employees, and that the scale of wages to be paid shall be posted by the contractor in a prominent and easily accessible place at the site of the work; and the further stipulation that there may be withheld from the contractor so much of the accrued payments as may be considered necessary to pay to the employees employed by the contractor, or any subcontractor on the work, the difference between the rates of wages required by the contract to be paid the employees on the work and the rates of wages received by the employees and not refunded to the contractor, subcontractors, or their agents.

(b) The terms "wages", "scale of wages", "wage rates", "minimum wages", and "prevailing wages" shall include:

(1) The basic hourly rate of pay; and

(2) The amount of:

(A) The rate of contribution made by a contractor or subcontractor to a trustee or to a third person pursuant to a fund, plan, or program; and

(B) The rate of costs to the contractor or subcontractor which may be reasonably anticipated in providing benefits to employees pursuant to an enforceable commitment to carry out a financially responsible plan or program which was communicated in writing to the employees affected, for medical or hospital care, pensions on retirement or death, compensation for injuries or illness resulting from occupational activity, or insurance to provide any of the foregoing, for unemployment benefits, life insurance, disability and sickness insurance, or accident insurance, for vacation and holiday pay, for defraying costs of apprenticeship or other similar programs, or for other bona fide fringe benefits, but only where the contractor or subcontractor is not required by other federal, state, or local law to provide any of the benefits; provided, that the obligation of a contractor or subcontractor to make payment in accordance with the prevailing wage determinations of the director of labor and training insofar as this chapter of this title and other acts incorporating this chapter of this title by reference are concerned may be discharged by the making of payments in cash, by the making of contributions of a type referred to in subsection (b)(2), or by the assumption of an enforceable commitment to bear the costs of a plan or program of a type referred to in this subdivision, or any combination thereof, where the aggregate of any payments, contributions, and costs is not less than the rate of pay described in subsection (b)(1) plus the amount referred to in subsection (b)(2).

(C) The term "employees", as used in this section, shall include employees of contractors or subcontractors performing jobs on various types of public works including mechanics, apprentices, teamsters, chauffeurs, and laborers engaged in the transportation of gravel or fill to the site of public works, the removal and/or delivery of gravel or fill or ready-mix concrete, sand, bituminous stone, or asphalt flowable fill from the site of public works, or the transportation or removal of gravel or fill from one location to another on the site of public works, and the employment of the employees shall be subject to the provisions of subsections (a) and (b).

**SECTION 37-13-9**

§ 37-13-9 statutory provisions included in contracts. – A copy of §§ 37-13-5, 37-13-6, and 37-13-7 shall be inserted in all contracts for public works awarded by the state, any city, town, committee, an authorized agency, or awarding authority thereof, or any person or persons in their behalf in which state or municipal funds are used if the contract price is in excess of one thousand dollars (\$1,000).

**CITY OF NEWPORT, RHODE ISLAND  
CONTRACT AND AGREEMENT**

THIS AGREEMENT, made this \_\_\_\_\_ day of \_\_\_\_\_ in the year 2013, by and between the City of Newport, herein called the "City", party of the first part acting herein through its Mayor, and \_\_\_\_\_, hereinafter called the "Contractor", party of the second part;

WITNESSETH: That the parties to these presents each in consideration of the undertakings, promises and agreements on the part of the other herein contained, have undertaken, promised and agreed, and do hereby undertake, promise and agree, the party of the first part itself, its successors and assigns, and the party of the second part for itself and heirs, executors, administrators, successors and assigns as follows:

**I. CONTRACT INCLUDES**

The Contractor shall furnish all labor, materials, equipment and services for **Roadway Improvement Program #13-050** and all appurtenant work as defined in the Contract Documents. The Contractor will construct, complete, and finish the same in a timely, thorough, workmanlike and substantial manner, in every respect to the satisfaction and approval of the Director of Public Services, in the manner and within the time hereinafter limited, and in strict accordance with the Notice to Bidders, Information for Bidders, Labor and Wage Requirements, Proposal Form, General Conditions of Contract, Special Conditions of Contract, and Specifications and Details for the work, which together constitute the Contract Documents and the Contract Documents are hereby made a part of this Contract as fully as if the same were repeated at length herein. Change Orders issued hereafter, and any other amendment executed by the City and Contractor shall become and be a part of this Contract.

**II. RATE OF PROGRESS AND TIME OF COMPLETION**

The Contractor shall be prepared to commence work under this Contract within ten (10) days after the date of Notice to Proceed. At no time shall the work to be performed under this contract exceed **November 15, 2013**, unless extensions of time are made for reasons and in the manner under Section "EXTENSION OF TIME" of the General Conditions of the Contract and/or under Section "ORDER TO SUSPEND WORK" of the Special Conditions of the Contract. If at any point during the term of this Contract the Contractor does not perform at a satisfactory pace or is continuously delayed in the performance of work in accordance with the agreed upon time schedule, the City shall notify the Contractor in writing of unsatisfactory progress for completing work. If the Contractor fails to substantially improve the performance of the Contract, the City shall proceed with the termination of this Contract in accordance with Section "TERMINATION BY THE CITY" of this Contract.

**III. TERM OF AGREEMENT**

Unless terminated earlier in accordance with the terms of this Agreement, this Agreement shall terminate on **November 15, 2013**. Throughout such time, all unit prices and work specifications as identified herein shall remain in effect.

**IV. DAMAGES FOR FAILURE TO COMPLETE ON TIME & AS SPECIFIED**

The Contractor shall pay to the City for each and every calendar day that he shall be in default in completing the entire work within the time and specifications stipulated, the sum of Five Hundred Dollars (\$500.00) per day unless the time and/or specifications are modified in writing by the City. This sum is hereby agreed upon, not as a penalty, but as liquidated damages, which the City will suffer by reason of such default. The City shall have the right to deduct the amount of any such damages from any moneys due the Contractor under this Contract.

**V. PAYMENT**

The City, in consideration of the faithful performance by the Contractor of all and singular his covenants, promises and agreements contained herein, agrees to pay the Contractor for the full completion by him of the work embraced in this Contract, in the manner and within the time herein specified and limited to the satisfaction and approval of the designated representative of the City, the prices stipulated in the said proposal, such payment to be made at the time and in the manner and upon the conditions herein expressly provided. Certified payrolls must be submitted prior to final payment.

**VI. PARTIAL AND FINAL ESTIMATES**

On or about the 15th day of each month, but no more than once a month, the Contractor may submit a Payment Request for the period ending the last day of the previous month. Said Payment Request shall be in such a format and include whatever supporting information as may be required by the City. Each Payment Request shall be signed by the Contractor and shall constitute the Contractor's representation that the quantity of work has reached the level for which payment is requested, that the work has been properly installed or performed in strict compliance with this contract and that the Contractor knows of no reason why payment should not be made as requested. Thereafter, the City shall review the Payment Request and may also review the work at the project site or elsewhere to determine whether the quantity and quality of the work is as represented in the Payment Request and is as required by this Contract. The City shall approve by signature the amount that, in the opinion of the City, is properly owing to the Contractor. The City shall retain five percent (5%) of the progress or monthly payments claimed and pay the Contractor on or before the last day of the following month.

Before final payment is made, the Contractor shall satisfy the City in writing that all bills for labor and materials have been paid, and pass a final inspection from the City's designated representative that determines all work performed under the contract is in compliance with all terms and provisions of all contract documents and applicable laws, rules, regulations, and codes.

The City shall, within thirty (30) days after full completion of all work, pay the entire sum so found to be due hereunder, after deducting there from all previous partial payments, and also all percentages and deductions to be retained under any of the provisions of this Contract. Before final payment is made, the Contractor shall satisfy the City, in writing that all bills for labor and materials have been paid.

## **VII. CONTRACT AMOUNT**

The total amount of the contract is based on the actual quantity of work items completed and the Contractor's unit bid price for each item. The contract award is \$\_\_\_\_\_. The total amount paid to the Contractor is dependent upon the amount and type of accepted work completed by the Contractor, and the Contractor's unit bid price for each item.

The Contractor shall comply with all State, Federal and local statutes, ordinances and regulations applicable to the execution and the performance of this Contract and shall procure all necessary licenses and permits.

The Contractor and his/her subcontractors are to maintain all books, documents, papers accounting records and other evidence pertaining to cost incurred, and to make such material available at their respective offices at all reasonable times during the contract period for three (3) years from the date of final payment under the Contract for inspection by the City or any authorized representatives of government, and copies thereof shall be furnished if requested.

## **VIII. LIABILITY**

- A. The Contractor agrees that his/her employees, sub-Contractors, or agents possess the experience, knowledge, and character necessary to qualify them individually for the particular duties they perform.
- B. The Contractor shall be liable for all damage caused by its negligent acts, in its services under this Contract or any supplements to this Contract, and shall indemnify and save harmless that City and all its officers, agents, and servants against any claims, suits, actions, damages, liabilities, and direct costs resulting from any negligent acts, willful or reckless misconduct, or negligent performance of the Contractor, in any forum, brought as a result of such negligent acts, willful or reckless misconduct or negligent performance, and shall carry liability insurance for that purpose, as specified by the City.

## **IX. INSURANCE**

- A. The Contractor shall procure and maintain, at its own expense during the life of the Contract, insurance liability for damages imposed by law, of the kinds and in the amounts specified, with insurance companies authorized to do business in the State. The insurance shall cover all work under this Contract, whether performed by the Contractor or by sub-Contractor. Before commencing the work, the Contractor shall furnish certificates of insurance in the form satisfactory to the City certifying that the policies will not be changed or canceled until 30-day written notice has been given to the City.

The types of insurance are as follows:

1. Statutory Workers Compensation and Employers' Liability Insurance for all of his/her employees to be engaged in work on the project under this Contract, and in case any such work is sublet, the Contractor shall require the sub-Contractor similarly to provide.

2. Workers Compensation and Employers' Liability Insurance for all of his/her employees to be engaged in such work. The Contractor shall file certificates with the Department's Contract Administrator showing that this insurance on behalf of all employees of the Contractor any sub-Contractor has been purchased prior to award of this Contract.
- B. The Contractor shall carry Liability and Property Damage Insurance with coverage in the following amounts:
    - (a) Public Liability, Bodily Injury, and Property Damage:
 

Injury or death each person:	\$1,000,000
Injury to more than one person in a single accident:	\$1,000,000
Property damage:	\$1,000,000
    - (b) Automobile and Truck Liability, Bodily Injury and Property Damage:
 

Injury or death of one person:	\$1,000,000
Injury to more than one person in a single accident	\$1,000,000
Property damage:	\$1,000,000
  - C. No cancellation of said insurance, whether by the insurers or by the insured, shall be valid unless written notice thereof is given by the party proposing cancellation to the other party and to the City at least thirty (30) days prior to the intended effective date thereof which date shall be expressed in said notice. Notice of cancellation sent by the party proposing cancellation by registered mail, postage prepaid, with a return receipt of addressee requested, and executed shall constitute proof of submission of said certificate. An affidavit from any officer, employee or agent, duly authorized by the insured, shall be prima facie evidence that the notice was sent. This section shall apply to the legal representative, trustee, and the successor in interest of such Contractor.
  - D. The failure of the Contractor to maintain insurance coverage in accordance with the terms of this Contract shall constitute a violation of this Contract. Such failure may result in termination of the contract, at the option of the City.
  - E. The Contractor shall take notice that the cancellation of any insurance under this Contract shall not affect the obligation of the Contractor to maintain each coverage, or his/her obligations under this ("Insurance") of this Contract, or his liability under Section VIII ("Liability") of this Contract.
  - F. The Contractor shall also take notice that his/her insurer must be licensed to do business in the State of Rhode Island.
  - G. The Contractor shall file copies of all required insurance certificates with the City. All insurance certificates mentioned in this Article shall be attached to this Contract prior to award.

**X. PERFORMANCE AND PAYMENT BOND**

The Contractor shall deposit with the City a surety company bond (or bonds) for the satisfactory completion of work and the payment of all debts pertaining to materials and labor used or employed in the execution of the Contract, in an amount equal to the

amount of the contract award. The form of the bond (or bonds) and the surety shall be licensed or have surplus line approval to do business in the State of Rhode Island. In the event the Contract Price is adjusted by Change Order executed by the City and Contractor, the bond (or bonds) shall be deemed increased by like amount.

Prior to final payment, the Contractor shall furnish a certificate from surety stating that the performance bond covers the one-year defective workmanship and materials guarantee.

#### **XI. SUPPLEMENTAL AGREEMENTS**

No change in the character or extent of the work to be performed by the Contractor and affecting the completion date or fee schedule shall be made except by supplemental agreement in writing between the City and the Contractor. The supplemental agreement will set forth the proposed work, any extension of time for completion, if required, and adjustment, if any, of the fee to be paid to the Contractor.

In any case where the Contractor believes extra compensation is due him/her for work and services not covered by this Contract or Supplement thereto, he/she shall notify the City in writing of his/her intention to seek such compensation before he/she begins the work. The request must be passed upon by the City. In the case where the request is determined to be justified, it shall be allowed and paid for as Extra Work/Additional Work in accordance with the terms of a supplemental agreement entered into before such work is started.

**The City also reserves the right to negotiate with the Contractor future work utilizing the unit prices associated with this contract.**

#### **XIII. ADDITIONAL TERMS**

1. The failure of the City to enforce at any time any of the provisions of the Contract, or to exercise any option which is herein provided, or to require at any time performance by the Contractor of any of the provisions hereof, shall in no way be construed to be a waiver of such provisions, nor in any way to affect the validity of this Contract of any part thereof, or the right of the State to thereafter enforce each and every provision.
2. This Contract shall inure to the benefit of and be binding upon the heirs, executors, administrators, assignees, and the successors of the respective parties hereto.
3. Should any part, term, or provision of this Contract be by a court of competent jurisdiction declared invalid, illegal, or in conflict with any law of the City, State or the United States, the validity of the remaining portions or provisions shall not be affected thereby.

#### **XIV. INDEMNITY**

The Contractor shall indemnify, defend and hold harmless the City, and its elected and appointed officers, directors, and employees (each, a "City Indemnitee"), from and against (and pay the full amount of ) any and all Loss-and-Expense incurred by a City Indemnitee to third parties arising from or in connection with: (1) any failure by the

Contractor to perform its obligations under this Contract; or (2) the negligence or willful misconduct of the Contractor or any of its officers, directors, employees, representatives, agents or Subcontractors in connection with this Contract, except to the extent caused by the negligence or willful misconduct of any City Indemnitee. The Contractor's indemnity obligations hereunder shall not be limited by any coverage exclusions or other provisions in any insurance policy maintained by the Contractor which is intended to respond to such events. A City Indemnitee shall promptly notify the Contractor of the assertion of any claim against it for which it is entitled to be indemnified hereunder, and the Contractor shall have the right to assume the defense of the claim in any Legal Proceeding and to approve any settlement of the claim. These indemnification provisions are for the protection of the City Indemnitees only and shall not establish, of themselves, any liability to third parties. The provisions of this Section shall survive termination of this Construction Contract.

**XV. TERMINATION BY THE CITY**

The City reserves the right to abandon, suspend or terminate the services of this Contract, or any part thereof, at any time, by giving written notice to the Contractor in accordance with Section 12 of the General Conditions.

Abandonment, suspension or termination of the Contract shall in no way limit any legal rights of the City.

**XVI. EXECUTION OF CONTRACT**

**IN WITNESS HEREOF**, the said parties hereto have caused this instrument to be signed by their duly constituted officers, attested, and sealed pursuant to proper resolutions.

By: \_\_\_\_\_  
Party of the First Part (Signature)

Henry F. Winthrop, Mayor, City of Newport, RI  
(Printed Name and Title)

\_\_\_\_\_  
Witness

By: \_\_\_\_\_  
Party of the Second Part (Signature)

\_\_\_\_\_  
(Printed Name and Title)

\_\_\_\_\_  
Witness

Approved as to form by:

\_\_\_\_\_  
Joseph J. Nicholson, Jr., City Solicitor

**FORM OF BOND  
FOR PERFORMANCE AND PAYMENT**

KNOW ALL MEN BY THESE PRESENTS: That \_\_\_\_\_

\_\_\_\_\_

a corporation created by and existing under the laws of the State of \_\_\_\_\_,

(hereinafter called the "Principal") and \_\_\_\_\_,

a corporation created by and existing under the laws of the State of \_\_\_\_\_,

(hereinafter called the "Surety") are held and firmly bound unto the \_\_\_\_\_,

(hereinafter called the "Owner") in the full and just sum of

\_\_\_\_\_ dollars (\$\_\_\_\_\_)

lawful money of the United States of America, to be paid to the said "Owner", its successors and assigns, to which payment well and truly to be made, we bind ourselves, our successors and assigns jointly and severally, firmly by these presents.

WHEREAS, the above bonded "Principal" has entered into a contract with the said "Owner" by and through the

\_\_\_\_\_

bearing date the \_\_\_\_\_ day of \_\_\_\_\_ 20\_\_\_\_, for the

CONSTRUCTION OF

\_\_\_\_\_

upon certain terms and conditions in said contract more particularly mentioned, and fully and specifically described in certain specifications made part of said contract; and

WHEREAS, it was one of the conditions of the award of the "Owner" pursuant to which said contract was entered into that these presents shall be executed.

NOW, THEREFORE, the condition of this obligation is such that if the above bounden "Principal" shall, in all respects, comply with and fulfill all the terms and conditions of said contract and its obligations thereunder, including the "Notice to Bidders", Information for Bidders", "Proposal", Contract and Agreement", "General Conditions of Contract", Special Conditions of Contract", "Detail Specifications" and "Plans", therein referred to and made a part thereof, and such alterations as may be made in said plans and specifications as therein provided for, and shall indemnify and save harmless the said "Owner" against or from all costs,

expense, damages, injury or loss to which the said "Owner" may be subjected to by reason of its failure to complete the work in accordance with its contract or by reason of any wrongdoing, misconduct, want of care or skill, negligence, or default, including patent infringement, on the part of the said "Principal", its agents or employees in the execution or performance of said contract, and shall promptly pay all just claims for damages for injury to persons or property and for labor and materials, incurred by said "Principal", in or about the construction or improvement contracted for, then this obligation to be void; otherwise to be and remain in full force and virtue in law.

IN WITNESS WHEREOF, the parties hereto have caused their corporate names and seals, respectively, to be hereunto subscribed and affixed by their officers in that behalf duly authorized, this

\_\_\_\_\_ day of \_\_\_\_\_, 20\_\_\_\_\_.

\_\_\_\_\_

\_\_\_\_\_

By \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

By \_\_\_\_\_

\_\_\_\_\_

Signed and delivered  
in the presence of:

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

**ACKNOWLEDGMENT FOR PRINCIPAL  
(INDIVIDUAL)**

State of \_\_\_\_\_

City of \_\_\_\_\_ to wit:

I, \_\_\_\_\_, a Notary Public in  
and for the City and State aforesaid, do certify that  
\_\_\_\_\_.

whose name is signed to the foregoing bond, personally appeared before me in my City and  
State aforesaid and acknowledged the same to be his act and deed.

My commission expires

\_\_\_\_\_.

\_\_\_\_\_

Notary Public

Given under my hand and seal this \_\_\_\_\_ day of

\_\_\_\_\_ 20\_\_\_\_\_.

**ACKNOWLEDGMENT FOR PRINCIPAL  
(PARTNERSHIP)**

State of \_\_\_\_\_

City of \_\_\_\_\_ to wit:

I, \_\_\_\_\_, a Notary Public in  
and for the City and State aforesaid, do certify that  
\_\_\_\_\_.

whose name is signed to the foregoing bond, personally appeared before me in my City and  
State aforesaid and acknowledged the same to be his act and deed.

My commission expires

\_\_\_\_\_.

\_\_\_\_\_

Notary Public

Given under my hand and seal this \_\_\_\_\_ day of

\_\_\_\_\_ 20\_\_\_\_\_.

**ACKNOWLEDGMENT FOR PRINCIPAL  
(CORPORATION)**

State of \_\_\_\_\_

City of \_\_\_\_\_ to wit:

I, \_\_\_\_\_, a Notary Public in  
and for the City and State aforesaid, do certify that  
\_\_\_\_\_.

whose name is signed to the foregoing bond, personally appeared before me in my City and  
State aforesaid and acknowledged the same to be his act and deed.

My commission expires

\_\_\_\_\_.

\_\_\_\_\_

Notary Public

Given under my hand and seal this \_\_\_\_\_ day of

\_\_\_\_\_ 20\_\_\_\_\_.

**ACKNOWLEDGMENT FOR SURETY**

State of \_\_\_\_\_

City of \_\_\_\_\_ to wit:

I, \_\_\_\_\_, a Notary

Public in and for the City and State aforesaid, do certify that

\_\_\_\_\_,

personally appeared before me in my City and State aforesaid and made oath that he is

\_\_\_\_\_ of the

\_\_\_\_\_.

that \_\_\_\_\_ is authorized by law to transact business in the State of Rhode Island and Providence Plantations; has complied with all laws relative to the execution of said bond; and that he is duly authorized to execute said bond for and on behalf of said company and to obligate the company with respect thereto.

My \_\_\_\_\_ commission expires

\_\_\_\_\_.

\_\_\_\_\_  
Notary Public

Given under my hand and seal this \_\_\_\_\_ day of

\_\_\_\_\_ 20\_\_\_\_\_.

## **GENERAL CONDITIONS OF CONTRACT**

### **SEC. 1 - CONTRACT DOCUMENTS**

The Contract Documents shall consist of Notice to Bidders, Information for Bidders, Labor and Wage Requirements, Proposal Form, Draft Contract and Agreement, General and Special Conditions of the Contract, Specifications, and Details, including all modifications and addenda thereof incorporated in any of the documents before execution of the Contract.

### **SEC. 2 - SPECIFICATIONS AND PLANS SUPPLEMENTARY**

The specifications and details are intended to supplement each other, and together constitute one complete set of instructions, so that any work exhibited in the one and not in the other shall be executed just as if it had been set forth in both, in order that the work shall be completed in every respect according to the complete design or design as decided and determined by the Engineer. In the event of a conflict, the specifications shall be considered as prevailing. Should the Contractor find that anything is omitted from the specifications, plans or details which are necessary for a clear understanding of the work, or that there is an error in either, the Contractor shall promptly notify the Engineer. From time to time during the progress of the work, the Engineer will furnish supplementary or working drawings as are necessary to show changes or define the work in more detail, and these shall also be considered as contract plans.

### **SEC. 3 - DEFINITIONS**

The word "City" as used herein shall mean the "Party of the First Part," acting through its properly authorized representatives.

The word "Engineer" shall mean the Director of Public Services whether acting directly or through properly authorized agents, inspectors or representatives of the Engineer, acting within the scope of duties entrusted to them.

The word "Contractor" shall mean the "Party of the Second Part," of this Contract, or his or their duly authorized agents.

The word "Addendum" shall mean a modification of the Contract documents issued by writing by the Engineer prior to the opening of the bids.

The term "ASTM" shall mean the American Society for Testing Materials.

The term "AWWA" shall mean the American Water Works Association.

The term "ASA" shall mean the American Standards Association.

The term "ANSI" shall mean the American National Standards Institute.

The term "NBFU" shall mean the National Board of Fire Underwriters.

The words "as described," "as required," "as permitted," "as allowed," or phrases of like effect or import as used herein shall mean that the direction, requirement, permission or allowance of the Engineer is intended, and similarly the words "approved," "reasonable," "suitable," "properly," "satisfactory," or words of the like effect or import, unless otherwise particularly specified herein, shall mean approved, reasonable, suitable, properly or satisfactory in the judgment of the Engineer.

#### **SEC. 4 - ENGINEER'S DECISION**

All work under this Contract shall be done to the satisfaction of the Engineer, who shall determine the amount, quality, acceptability and fitness of the several items of work and materials that are to be paid for hereunder. He shall decide also all questions that may arise as to the fulfillment of the terms of the Contract by the contractor, and as to the intent and purpose of the Contract or specifications. The determination of the Engineer in all such matters shall be final and binding upon the parties thereto.

#### **SEC. 5 - INSPECTION**

The City, at its own expense, has appointed and employed the Engineer whose duty it is to observe and inspect, in the City's interest, the materials furnished and the work done as the work progresses in order to insure full and complete compliance with the Contract. It is agreed that the City may also, at its pleasure and at its own expense, appoint and employ such other persons as may be necessary for those purposes. The Engineer and all such other persons referred to shall have unrestricted access to all parts of the work and to other places at and which the preparation of the materials and other parts of the work to be done under this Contract are carried on and conducted and shall be given by the Contractor all facilities and assistance required to carry out their work of observation and inspection.

The Engineer and his authorized representatives and agents shall have free access to Contractor's payrolls, records of personnel, invoices of materials and other data and records.

It is not the function of the Engineer to supervise or direct the manner in which the work to be done under this Contract is carried on or conducted. Nevertheless, the Contractor agrees that any method or procedure, which in the opinion of the Engineer does not achieve the required results or quality of the work specified, shall be discontinued immediately upon the order of the Engineer.

The Engineer shall have the authority to reject any work, or materials, or any part thereof, which does not in his opinion conform to the specifications and Contract, and it, shall be permissible for him to do so at any time during the progress of the work and until its acceptance.

No work shall be done except in the presence of the Engineer or his assistants. No material of any kind shall be used upon the work until it has been inspected and accepted by the Engineer. All materials rejected shall be removed immediately from the work area and not again offered for inspection. Any material or workmanship found at any time to be defective or not of the quality or character required by the specifications shall be remedied at once regardless of previous inspection.

Such inspection shall not relieve the Contractor from any obligation to perform said work strictly in accordance with the specifications and work not so constructed shall be removed and made good by the Contractor at his own expense, and free of all expense to the City whenever so ordered by the City without reference to any previous oversight or error in inspection.

## **SEC. 6 - OBLIGATION OF CONTRACTOR**

The Contractor shall, at his own cost and expense, provide any and all manner of superintendence, insurance, taxes, labor, materials, apparatus, scaffolding, appliances, tools, machinery, power, transportation and whatever else may be required of every description necessary to do and complete the work, and shall be solely answerable for the same and for the safe, proper and lawful construction, maintenance and use thereof. The Contractor shall cover and protect the work from damage, and make good all injury to the same occurring before the completion of this Contract. The Contractor shall employ only competent men and shall provide an experienced superintendent who shall be present at all times that work is in progress. The Contractor shall also provide experienced foreman on each part of the work. Should the Engineer determine that any of the Contractor's employees is incompetent or irresponsible toward public health and safety or any other reason detrimental to the work he can order the removal of such person or persons from the work and the Contractor shall comply with such order.

The Contractor shall, at his own expense wherever necessary or required, maintain fences, provide watchmen, maintain lights, place additional timber and braces, and take such other precautions as may be necessary to protect life, property, existing utilities and services, and structures, and shall be liable for all damages occasioned in any way by his act or neglect, or that of his agents, employees or workmen. He shall provide access at all times to private property.

## **SEC. 7 - PATENT RIGHTS**

The Contractor shall indemnify and save harmless the City and its officers, agents and representatives from all claims and damages, arising from the infringement or alleged infringement of any Letters Patent or patent rights covering any material, appliance or device used in or upon the work or any part thereof.

All royalties for patents or patent infringement claims that might be involved in the construction or use of the work shall be included in the Contract amount, and the Contractor shall satisfy all demands that may be made at any time for such, and shall be liable for any damages or claims for Patent infringements; and the Contractor shall, at his own expense, defend any and all suits or proceedings that may be instituted against the City for infringement or alleged infringement of any patent or patents involved or alleged to be involved in the work; and in case of an award of damages, the said Contractor shall pay such award.

## **SEC. 8 - DEFENSE OF SUITS**

In case any action at law or suit in equity may or shall be brought against the City or any of its representatives or agents for or on account of the failure, omission or neglect of the Contractor or his sub-contractors or his or their employees or agents to do and perform any of the covenants, acts, matters or things by this Contract undertaken or to be done or performed by the Contractor or his sub-contractors, or his or their employees or agents, or for any injury or damage caused by the negligence or alleged negligence of the Contractor or his sub-contractors, his or their employees or agents, the Contractor shall indemnify and save harmless the City, its representatives, agents and servants and

the Engineer of and from all loss, cost, damage, expense, judgment or decrees whatever arising out of such actions or suits as may or shall be damaged as aforesaid.

#### **SEC. 9 - PERMITS, LAWS, AND ORDINANCES**

The Contractor shall keep himself fully informed of all existing and current ordinances and regulations and Municipal, County, State or National laws in any way limiting or controlling the actions or operations of those engaged upon the work or affecting the materials supplied to or by them. He shall at all times observe and comply with all such valid and legally binding ordinances, Laws and regulations and shall protect and indemnify the City and its representatives and agents against any claim or liability arising from or based on any violation of the same. He shall take out and carry appropriate employers' liability insurance and public liability insurance. He shall obtain and pay for all necessary permits and pay all fees required in connection with the Contract.

#### **SEC. 10 - ASSIGNMENT OF CONTRACT**

The Contractor shall have no right or power to assign this Contract, in whole or in part, nor to assign any right arising or moneys due or to grow due thereunder, without formal approval of the City.

#### **SEC. 11 - SUBLETTING**

No part of the work embraced in this Contract shall be sublet or subcontracted in any way except with the written consent of the City, but this provision shall not apply to the purchase and delivery of materials necessarily manufactured and provided elsewhere.

#### **SEC. 12 - COMPLETION OF WORK BY CITY**

If the work to be done under this Contract shall be abandoned by the Contractor, or if this Contract shall be assigned, or the work sublet by him, otherwise than as herein specified, or if at any time the Engineer shall be of the opinion that the performance of the Contract is unnecessarily or unreasonably delayed or that the Contractor is willfully violating any of the conditions or covenants of this Contract, or of the specifications, or is executing the same in bad faith or not in accordance with the terms thereof; or if the work be not fully completed within the time named in this Contract for its completion, or within the time to which the completion of the Contract may be extended by the City, the City may notify the Contractor to discontinue all work, or any part thereof under this Contract, by a written notice to be served upon the Contractor, as herein provided; and the Contractor shall within five (5) days of the service of said notice, discontinue the work, or such part thereof, and the City shall thereupon have the power to contract for the completion of the Contract in the manner prescribed by law, or to place such and so many persons as it may deem advisable, by Contract or otherwise, to work, and complete the work herein described, or such part thereof; to take possession of and use any of the materials, plant, tools, equipment, supplies and property of every kind provided by the Contractor for the purpose of his work and to procure other materials and equipment for the completion of the same, and to charge the expense of said labor and materials to the Contractor. The expense so charged shall be deducted and paid by the City out of such moneys as may be due or may at any time thereafter grow due to the Contractor under and by virtue of this Contract, or any part thereof. And in case such expense shall exceed the amount which would have been payable under the Contract if the same had been completed by the Contractor, the Contractor or his surety

shall pay the amount of such excess to the City; and in case such expense shall be less than the amount which would have been payable under this Contract if the same had been completed by the Contractor, the City shall pay such difference to the Contractor.

### **SEC. 13 - CLAIMS FOR LABOR AND MATERIALS**

The Contractor shall indemnify and save harmless the City from all claims for labor done and for materials furnished under this Contract, or any alterations or modifications thereof and shall furnish the City with satisfactory evidence, when called for by it, that all persons who have done work, or furnished materials under the laws of the State, have been fully paid or satisfactorily secured, and in case such evidence is not furnished, an amount necessary or sufficient within the discretion of the City to meet the claims of the persons aforesaid shall be retained, in addition to any other money due the Contractor under this Contract, until the liabilities aforesaid shall be fully discharged or satisfactorily secured.

### **SEC. 14 - MODIFICATIONS AND EXTRA WORK**

The Contractor in entering into this Contract understands that the City reserves the right to modify the arrangement, character, or size of the work or appurtenances whenever in its opinion it shall deem it necessary or advisable so to do. Minor changes in the work not involving extra cost and not inconsistent with the purpose of the work may be made by verbal order, but no modifications involving substantial extra work or changes shall be made unless ordered in writing by the Engineer. The Contractor shall and will accept such modifications when ordered in writing by the Engineer, and the same shall not vitiate or void this Contract. Any such modifications so made shall not, however, subject the Contractor to increased expense without equitable compensation. If such modifications result in a decrease in the cost of the work involved, an equitable deduction from the Contract price shall be made.

### **SEC. 15 - PAYMENT FOR EXTRA WORK**

The Contractor agrees that he will accept as full compensation for extra work, the unit prices bid, where such are applicable; and for such items as are not properly covered by unit prices, a lump sum agreed upon as reasonable by the Engineer and the Contractor. If an agreement cannot be made on payment for the extra work on a unit price or lump sum basis, the Contractor will accept as full compensation the reasonable cost, as determined by the Engineer, of all necessary labor, including insurance and payroll taxes, equipment rental and materials, plus twenty per cent (20%) which covers superintendence, the use of tools and plant, and other overhead expense and profit. In case the extra work is performed by a previously approved subcontractor, the total allowance that covers superintendence, the use of tools and plant, and other overhead expenses and profit shall be twenty-five per cent (25%) instead of twenty per cent (20%) as stated above.

Equipment rental charges shall be the pro-rated charge actually paid by the Contractor in the case where equipment is rented, except that this rental charge shall not exceed the latest rental rates compiled by the Associated Equipment Distributors. If the equipment is owned by the Contractor, the equipment rental charge shall be pro-rated on the basis of the monthly rates compiled by the Associated Equipment Distributors. All fuel and lubrication costs will be paid for separately.

The Contractor agrees to prosecute such extra work with all reasonable diligence, and to employ thereon competent men. The Contractor shall give the Engineer access to all accounts, bills, payrolls, and vouchers relating to extra work not covered by unit prices, and he agrees that he shall have no claim for compensation for such extra work in the case of items not covered by unit prices unless a statement in writing of the actual cost of the same, fully itemized as to labor and materials, is presented to the engineer before the thirtieth (30th) day of the month following that during which each specific order was complied with by him.

#### **SEC. 16 - CLAIMS FOR UNAUTHORIZED EXTRA WORK**

If the Contractor performs work which he considers is not included under any of the items of the Contract and which has not been specifically ordered in writing by the Engineer as extra work, he shall make a claim for extra payment for such work by immediate oral notice followed by written notice within seven (7) days after the occurrence to the Engineer, with detailed cost data to support his claim within thirty (30) days after the said work is performed. Should such work extend over a period of more than thirty (30) days, he shall submit monthly records of all cost data relating to the claim for extra payment of such work.

#### **SEC. 17 - GUARANTEE**

The Contractor guarantees the work done under this Contract, and that the materials furnished by him and used in the construction of the same are free from defects or flaws, and the guarantee is for a term of one (1) year from and after the date upon which the final estimate of the Engineer is formally approved by the party of the first part. It is hereby, however, agreed and understood that this guarantee shall not include any repairs made necessary by any cause or causes other than defective materials furnished by or defective work done by the Contractor.

#### **SEC. 18 - REPAIRS FOR ONE YEAR**

The Contractor agrees that he/she will furnish prior to payment of the final estimate, a certificate from his surety stating that the performance bond covers the above one-year guarantee. The Contractor shall make such repairs on the work as may be required by the Contractor's guarantee.

#### **SEC. 19 - RATE OF PROGRESS AND SEQUENCE OF WORK**

The Contractor shall, within two (2) calendar days after the date of the pre-construction meeting and before commencing work, submit to the City Engineer for approval a construction schedule showing dates of starting and completion of various parts of the work to be consistent with the sequence and timelines as described herein. No work shall begin until an approved construction schedule is in effect and a Notice to Proceed has been issued by the City. Thenceforth, the rate of progress shall be such that the whole work will be completed and the grounds cleaned up within the Contract time.

The Contractor will proceed with the work at such rate of progress to insure full completion within the time stipulated in the contract documents. It is expressly understood and agreed, by and between the Contractor and the City, that the contract time for the completion of the work described herein is a reasonable time, taking into

consideration the average climactic and economic conditions and other factors prevailing in the locality of the work.

If, at any time before the commencement or during the progress of the work, the materials, labor and appliances used or to be used by the Contractor appear to the Engineer to be insufficient or improper for securing the quality of work required or the required rate of progress, The Engineer may order the Contractor to increase their efficiency or to improve their character, and the Contractor shall conform to such order; but the failure of the Engineer to demand any such increase or efficiency or any such improvements shall not release the Contractor from his obligation to secure the quality of the work or the rate of progress specified.

#### **SEC. 20 - EXTENSION OF TIME**

The Contractor expressly covenants and agrees that in undertaking to complete the work sufficiently to permit operation of the major units and to complete the entire work within the times stated in the Contract, he has taken into consideration and made allowance for all of the ordinary delays and hindrances incident to such work, whether growing out of delays in securing materials or workmen, or otherwise. Should the Contractor, however, be substantially delayed in the prosecution and completion of the work by any substantial changes, additions, or omissions therein ordered in writing by the Engineer, or by fire, lightning, earthquake, tornado, cyclone, riot, insurrection or war, or by the abandonment of the work by the workmen engaged therein through no fault of the Contractor, or by the discharge of all or any material number of workmen in consequence of difficulties arising between the Contractor and such workmen, or by the neglect, delay or default of any other Contractor of the City, the Contractor may, within five (5) days after the occurrence of the delay for which he claims allowance, notify the Engineer thereof in writing, and thereupon, and not otherwise, the Contractor shall be allowed such additional time for the completion of the work as the Engineer in his discretion shall award in writing.

#### **SEC. 21 - LIABILITY OF CONTRACTOR FOR EMPLOYEES**

Each and every employee of the Contractor, and each and every of his subcontractors engaged in the said work shall, for all purposes, be deemed and taken to be the exclusive servants of the Contractor and not for any purpose or in any manner in the employment of the City. The Contractor shall in no manner be relieved from responsibility or liability on account of any fault or delay in the execution of the said work, or any part thereof, by any such employee, or any such subcontractor, or any material men, whatsoever.

#### **SEC. 22 - NO WAIVER OF RIGHTS**

No certificate given or payment made under this Contract, except the final certificate or final payment, shall be evidence of the performance of the Contract either wholly or in part, and no payment shall be construed to be an acceptance of defective work or improper materials. No act of the City or of the Engineer, or of any representative of either of them, in supervising the work, nor any extension of time for the completion of the work, shall be regarded or taken as an acceptance of such work, or any part thereof, or of materials used therein or thereof, either wholly or in part; but such acceptance shall be evidenced only by the final certificate of the Engineer as approved by the City.

Before any final certificate shall be allowed, the Contractor will be required, and he hereby agrees, to sign and attest on said certificate a statement that he accepts the same in full payment and settlement of all claims on account of work done and materials furnished under this Contract, and furthermore that all claims for materials provided or labor performed have been paid or satisfactorily secured. No waiver of any breach of this Contract by the City or anyone acting for it or on its behalf shall be held as a waiver of any other or subsequent breach thereof.

**SEC. 23 - VERBAL STATEMENTS NOT BINDING**

It is understood and agreed that the written terms and provisions of this agreement shall supersede all prior verbal statements of the Engineer or other representatives of the City, and such statements shall not be effective or be construed as entering into or forming a part of, or altering in anywise whatsoever, the written agreement.

**SEC. 24 - RELEASE OF LIABILITY**

No person or corporation other than the signer of this Contract as Contractor now has any interest hereunder, and no claim shall be made or be valid, and neither the City or any employee or agent thereof shall be liable or be held to pay any money, except as hereinbefore provided. The acceptance by the Contractor of the final payment shall operate as and shall be a release to the City and every representative and agent thereof, from all claims and liability to the Contractor for anything done or furnished for, or relating to the work, or for any act or neglect of the City or any person relating to or affecting the work. No payment, however, final or otherwise, shall operate to release the Contractor or his sureties from any obligation under this Contract or the Performance and Payment Bond.

## **SPECIAL CONDITIONS OF CONTRACT**

### **1.0 WORKING CONDITIONS**

The Contractor shall provide working conditions on each operation that shall be as safe and as healthful as the nature of the work permits. He shall inform himself of and shall comply with all safety and sanitary rules, laws, and regulations.

The Contractor shall maintain a safe drinking water supply readily available to all workers. A sufficient number of chemical type sanitary structures shall be provided for workmen on the project. They shall be located near the points of work. They shall be cleaned daily and shall be adequately serviced.

### **2.0 CARE AND PROTECTION OF WORK**

From the commencement of work until the completion of the same, the Contractor shall be solely responsible for the protection and care of the work covered by the Contract and for the material delivered to the site. All injury, damage, or loss of the same, from whatever cause, shall be made good at his expense. He shall take all necessary precautions to prevent injury or damage to the work by flood, freezing, or inclement weather at any and all times. The methods used for this purpose shall be subject to approval of the Engineer.

### **3.0 SHOP DRAWINGS**

The Contractor shall furnish shop drawings, descriptive literature, and other required information for all the manufactured items. Three (3) copies shall be submitted to the Engineer for approval prior to fabrication. Approval by the Engineer of the shop drawings for any material apparatus, device and layout shall not relieve the Contractor from the responsibility of furnishing same of proper dimension, size, quality, quantity, and all performance characteristics to efficiently perform the requirements and intent of the Contract Documents. Approval shall not relieve the Contractor from responsibility for errors of any sort on the shop drawings. If the shop drawings deviate from the Contract Documents, the Contractor shall advise the Engineer of the deviations in writing, including the reason for the deviation.

Prior to the submittal of shop drawings of manufactured items, the Contractor shall check and approve the drawings. He shall indicate his approval by initials and date, and shall also indicate by reference the specification and/or plan which covers the item.

### **4.0 MATERIALS AND MANUFACTURED ARTICLES**

All material and workmanship shall be subject to the approval of the Engineer and shall be in conformity with approved modern practice.

In general, wherever the Contract Documents show or specify a particular make of material, article, device or equipment, it shall be regarded as a standard.

When reference is made in the Contract Documents to standards or specifications of associations such as AWWA, ASTM or others, the provisions of the latest revision of the standard or specification shall be applicable. If two or more makes of materials, manufactured articles, devices or equipment are shown or specified, each should be

regarded as the equal of the other. Any other make of material, manufactured article, device or equipment which is the recognized equal of that specified, and is suitable for the purpose intended, will be accepted. In all cases, new materials shall be used, unless this provision is waived by notice from the Engineer in writing.

#### **5.0 WORK IN BAD WEATHER**

During freezing, stormy, or inclement weather, only work that can be done satisfactorily and in a manner to secure first-class construction throughout, shall be done.

#### **6.0 NIGHT AND SUNDAY WORK**

Unless otherwise specially permitted, no work shall be done between the hours of 6:00 p.m. and 7:00 a.m., nor on weekends (Saturday or Sunday), nor on state or federal holidays, except as necessary for the proper care and protection of the work already performed. If it shall become absolutely necessary to perform work at night, the Engineer shall be informed at least twenty-four (24) hours in advance of the beginning of performance of such work. Only such work shall be done at night as can be done satisfactorily and in a first-class manner without creating public nuisance(s). Good lighting and all other necessary facilities for carrying out and inspecting the work shall be provided and maintained at all points where such work is being done. Any work necessary to be performed after regular working hours, such as on legal holidays, shall be performed without additional expense to the Owner.

#### **7.0 WATER SUPPLY AND ELECTRICAL ENERGY**

The Contractor shall make his own arrangements for obtaining the electrical energy and a water supply necessary for construction purposes.

#### **8.0 PUBLIC SAFEGUARDS**

The Contractor agrees to conduct the work at all times in such a manner that public travel shall not be inconvenienced needlessly, nor shall it be wholly obstructed at any point. He further agrees to be responsible for all legal notices, detour and warning signs, to notify the police and fire departments of the condition of the roads while the work is in progress, providing watchmen, barricades, red lights, danger and warning signs, and such other precautions necessary to protect life and property.

#### **9.0 STORAGE OF MATERIALS**

Materials shall be stored so as to insure the preservation of their quality and fitness for the work. When considered necessary, they shall be placed on wood platforms and covered, or stored in a suitable building as directed by the Engineer. Stored material shall be located so as to facilitate prompt inspection.

If requested the City **may** provide limited storage space for the Contractor at the City Yard, located at 80 Halsey Street. If the Contractor makes use of space at City Yard they must coordinate with designated representatives of the City whenever material enters or exits city property. Only approved equipment and materials may be stored. **At no time may a Contractor store personal vehicles at City Yard.** Upon completion of the work set forth within the Contract document and before final acceptance and payment the Contractor shall, except as otherwise expressly directed or permitted in writing, clean and remove from the sites and adjacent property all stored, surplus, and discarded

materials, rubbish and temporary structures. The Contractor shall restore in an acceptable manner all property which has been altered or used during the performance of the work and leave the whole in a neat and presentable condition, to the satisfaction of the Engineer.

#### **10.0 CONTRACTOR'S EMPLOYEES**

The Contractor shall be represented by an experienced superintendent on the project site at all times when work is in progress. Only skilled foremen and workmen shall be employed on work requiring special qualifications.

In the event that any Contractor employee neglects to properly serve the public or Owner in a courteous and efficient manner, fails to conduct him/herself properly at the Site, or permits or causes any violation of this Agreement, the Contractor agrees not to employ such person at the Site and Contractor shall replace such person within a reasonable time with a competent and trained employee.

#### **11.0 CLEANUP**

During the progress of the work, the Contractor shall keep the site in a generally neat condition. Lunch papers, bottles, lumber cut-offs, drinking cups, and like rubbish shall be removed from the site daily. The work shall be cleaned up as the various portions of the project are completed.

Upon completion of the work and before acceptance and final payment shall be made, the Contractor shall, except as otherwise expressly directed or permitted in writing, clean and remove from the sites and adjacent property all surplus and discarded materials, rubbish and temporary structures. He shall restore in an acceptable manner all property which has been damaged during the performance of the work and leave the whole in a neat and presentable condition.

The Contractor shall remove all plant, surplus, and waste materials from the site as soon as the work is completed.

#### **12.0 PAYMENT FOR TEMPORARY WORK**

No direct or separate payment will be made for providing miscellaneous temporary works, plant, services, Contractor's offices, layout surveys, job description signs, sanitary requirements, safety devices, watchmen, bonds, and insurance. Compensation for all such services, things, and materials shall be considered as having been included in the price stipulated for the Contract items.

#### **13.0 ORDER TO SUSPEND WORK**

If the Engineer considers that any portion of the work should be suspended temporarily because of extreme weather conditions or special events or activities in Newport or for any other reason, he shall order in writing the Contractor to suspend work until conditions permit its resumption. Suspension of work by order of the Engineer shall be considered as a reason for extension of time beyond the completion time previously stated in the Contract.

#### **14.0 STATE LAWS AND REGULATIONS**

The Contractor shall comply in all respects with the General Laws of Rhode Island, 1956, relative to registration of motor vehicles, loading of trucks, conditions of work, employment of labor, prevailing wage scales, and fringe benefits and the acts amendatory thereof and supplemental thereto. The Contractor shall give preference in employment on the work to be performed under this Contract to resident citizens of the City of Newport.

Safety Code - The Contractor's attention is directed to the safety requirements of the Rhode Island Department of Labor, Industrial Code Commission for Safety and Health, Industrial Safety Code No. 14, Safety Code for Construction Industry, and amendments thereof.

#### **15.0 PROPERTY MARKERS DISTURBED**

The Contractor shall, at his own expense, retain the services of a licensed surveyor to replace property markers on or adjacent to privately owned property that have been disturbed during the course of construction.

#### **16.0 LINES AND GRADES**

The Contractor shall keep the Engineer informed, a reasonable time in advance, of the times and places at which he intends to do work, in order that lines and grades may be checked and necessary measurements for record and payment made with a minimum of inconvenience to the Engineer or delay to the Contractor. The Contractor shall have no claim for damages or extension of time on account of delays in the giving of lines and grades making record measurements or destruction of such marks and the consequent necessary for replacement. The Engineer will furnish the Contractor with such basic information as to lines and grades as he, the Engineer, deems necessary, but this shall not be construed to mean all lines, grades, elevations, and measurements will be made by the Engineer.

The Contractor shall furnish necessary services and assistance of chainmen as required and all wooden stakes, spikes, monuments, or markers of the type and material designated by the Engineer for the proper placement, marking and preservation of all lines and grades necessary under this Contract.

The Contractor shall furnish all labor and materials necessary or proper for batter boards and other facilities for transferring, marking, and preserving all lines, marks or grades that may be given to the Contractor by the Engineer. He shall carefully follow and preserve all such lines, marks and grades. All work during its progress and on its completion shall conform to the plans; it being understood and agreed, however, that such plans may be modified from time to time, in the manner and to the extent herein provided.

**PROPOSAL FORMS  
CITY OF NEWPORT, R.I.  
Roadway Improvement Program 2013 #13-050**

(These Proposal Forms shall not be detached from the Contract Documents and the entire booklet shall be included with each signed proposal.)

The undersigned, as bidder, declares that no person or persons other than those named herein are interested in this proposal; that this proposal is made without collusion with any other person, firm or corporation; that he has carefully examined the location of the proposed work, the proposed form of contract, and the plans therein referred to; that no person or persons acting in any official capacity for the City is directly or indirectly interested therein or in any portion of the profit thereof; and that he proposes and agrees, if this proposal is accepted, to execute the form of contract with the City, to provide all necessary equipment, tools, and other means of construction, and to do all work and furnish all the materials shown and specified in the Contract Documents, and according to the requirements of the Director of Public Services as therein set forth, and that he will take in full payment therefore, the following sums to wit:

The undersigned further understands that the quantities of work as shown are approximate only and are subject to increase or decrease and offers to do the work whether the quantities are increased or decreased, at the unit prices stated.

All prices must be written in words and figures. In case of discrepancy, the amount shown in words will govern.

Bidder acknowledges receipt of the following addendum:

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(Signature)

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(Title)

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(Name of Firm or Corporation)

The Bid provided here represents the Bidder's NOT TO EXCEED proposal to the City of Newport for **Roadway Improvement Program 2013 #13-050** as identified in these Contract Documents. The Contractor agrees to perform all of the work contained within the Contract, at the discretion of the City, in accordance with all terms and specifications contained herein at the proposed unit prices.

**Proposal Pages may be found in the Appendix of these Contract Documents**

---

Complete Company Name

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Mailing Address, City, Zip Code

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Telephone Number

Fax Number

E-Mail Address

The undersigned agrees that he will execute the Contract within ten (10) days (not including Sunday) after the Notice to Proceed date and will submit in writing within ten (10) days after the date of the Contract, a schedule of construction showing dates of starting and completion of major portions of the work, and will progress in accordance with said schedule, unless the Director of Public Services shall authorize or order a delay, to the partial and entire completion of the work within the time stipulated in the Contract.

Signature of person, firm, or corporation making bid:

**SEAL**

(If bid is by a corporation)

\_\_\_\_\_  
(Signature)

\_\_\_\_\_  
(Title)

\_\_\_\_\_  
(Name of Firm or Corporation)

\_\_\_\_\_  
(Address)

\_\_\_\_\_  
(Email Address)

\_\_\_\_\_  
(Date)

\_\_\_\_\_  
(Phone)

**Corporate Information Page  
Roadway Improvement Program #13-050**

**List the Officers of your Corporation or Principals of your LLC or attach a similar sheet separately. Award cannot be done without the attachment**

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Complete Company Name

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Name	Title/Officer/Position
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Name	Title/Officer/Position
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Name	Title/Officer/Position
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Name	Title/Officer/Position
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Name	Title/Officer/Position
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Name	Title/Officer/Position
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Name	Title/Officer/Position
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**NOTE:** Please provide any literature you feel may be necessary.

**QUESTIONNAIRE**

The undersigned guarantees the accuracy of all statements and answers herein contained.  
(Please print in ink)

1. How many years has your corporation been in business as a general contractor?  
\_\_\_\_\_years.

2. List up to three (3) projects of this nature that you have completed and give the name, address and telephone number of a reference from each. Also give the completed cost of each project listed.  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

3. List projects currently under construction by your firm, the dollar volume of the contract and the percent the contract is completed.  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

4. Have you ever performed work for a municipality previously? (If municipalities are listed under 2, this question need not be completed.)  
\_\_\_\_\_  
\_\_\_\_\_

5. Have you ever failed to complete work awarded to you; if so, state where and why?  
\_\_\_\_\_  
\_\_\_\_\_

6. Have you or your authorized representative personally inspected the location of the proposed work and do you have a clear understanding of the requirements of the Plans, Specifications and other Contract Documents.

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7. Do you plan to sublet any part of this work? If so, give details.

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8. What equipment do you own that is available for this work?

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9. What equipment do you plan to rent or purchase for this work?

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10. Have you ever performed work under the direction of a Consulting Engineer or a Registered Architect? If so, list up to three such firms giving the name of the firm, its address, telephone number and the name of the project. (List most recent projects)

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11. Give the name, address and telephone number of an individual who represents each of the following and whom the City may contact to investigate your financial responsibility; a surety, a bank and a major material supplier.

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12. Give a summary of your financial statement. (List assets and liabilities, use an insert sheet if necessary)

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13. State the true, exact, correct and complete name of the partnership, corporation or trade name under which you do business, and the address of the place of business. (If a corporation, state the name of the President and Secretary. If a partnership, state the names of the individuals who do business under the trade name.) It is absolutely necessary that this information be furnished.

\_\_\_\_\_

Correct Name of Bidder

(a) The Business is

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(b) The address of principal place of business is:

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(c) The names of the corporate officers, or partners, or individuals doing business under a trade name, are as follows:

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Telephone Number: \_\_\_\_\_

## APPENDIX

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>A-1</b>	<b>81</b>	<b>EA</b>	<b>Remove &amp; Reset Frames and Covers/Grates</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>A-2</b>	<b>12</b>	<b>EA</b>	<b>Frame &amp; Cover Standard 6.1.1 (Square)</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>A-3</b>	<b>12</b>	<b>EA</b>	<b>Frame &amp; Cover Standard 6.2.1 (Round)</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>A-4</b>	<b>4</b>	<b>EA</b>	<b>Frame &amp; Grate Standard 6.3.1 (Catch)</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>A-5</b>	<b>23</b>	<b>EA</b>	<b>Modify Catch Basin/Vertical Walls</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>A-7</b>	<b>81</b>	<b>EA</b>	<b>Remove &amp; Reset Roadway Service Gate Box</b>  \$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>A-8</b>	<b>23</b>	<b>EA</b>	<b>Furnish &amp; Install Roadway Service Gate Box</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>A-9</b>	<b>161</b>	<b>EA</b>	<b>Remove &amp; Reset Curb Stop Service Gate Box</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>A-10</b>	<b>12</b>	<b>EA</b>	<b>Furnish &amp; Install Curb Stop Service Gate Box</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-1</b>	<b>27,336</b>	<b>SY</b>	<b>Pavement Reclamation</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-3</b>	<b>2,668</b>	<b>CY</b>	<b>Roadway Excavation</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-4</b>	<b>4,819</b>	<b>CY</b>	<b>Remove &amp; Stockpile Excess Material</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>B-5</b>	<b>92</b>	<b>CY</b>	<b>Remove &amp; Dispose Unsuitable Material</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-6</b>	<b>12</b>	<b>SY</b>	<b>Remove &amp; Dispose Cobblestones</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-7</b>	<b>12</b>	<b>CY</b>	<b>Remove &amp; Dispose Concrete Road Base</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-8</b>	<b>184</b>	<b>SY</b>	<b>Remove &amp; Stockpile Belgian Blocks</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-9</b>	<b>0</b>	<b>SY</b>	<b>Furnish &amp; Install Geogrid</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)
<b>B-10</b>	<b>3,876</b>	<b>CY</b>	<b>Furnish &amp; Install Crushed Processed Gravel</b>
			\$ _____ \$ _____ \$ _____ (price in words) (price in figures) (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>B-11</b>	<b>3,876</b>	<b>CY</b>	<b>Installation of Excess Material</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>B-12</b>	<b>51,267</b>	<b>SY</b>	<b>Fine Grading &amp; Compaction</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>C-1</b>	<b>5,750</b>	<b>TN</b>	<b>Furnish &amp; Install Bit Conc. Base Course-Mech.</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>C-2</b>	<b>5,750</b>	<b>TN</b>	<b>Furnish &amp; Install Bit Conc. Top Course Class I-1</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>C-3</b>	<b>69</b>	<b>TN</b>	<b>Furnish &amp; Install Bit Conc. Temp-Non-Mech</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>C-4</b>	<b>15,100</b>	<b>LF</b>	<b>Furnish &amp; Install Bituminous Berm</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>D-1</b>	<b>2,105</b>	<b>LF</b>	<b>Remove &amp; Reset Existing Curb</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>D-2</b>	<b>138</b>	<b>LF</b>	<b>Remove &amp; Stockpile Existing Curb</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>D-3</b>	<b>3,082</b>	<b>LF</b>	<b>Furnish &amp; Install New Granite Curb</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>D-5</b>	<b>12</b>	<b>EA</b>	<b>Furnish &amp; Install New Granite Inlet Stone</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-1</b>	<b>4,336</b>	<b>SY</b>	<b>Furnish &amp; Install 5" PCC Sidewalk Class A</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-2</b>	<b>1,219</b>	<b>SY</b>	<b>Furnish &amp; Install 6" PCC Driveway/WCR Class A</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>E-3</b>	<b>449</b>	<b>SF</b>	<b>Furnish &amp; Install Detectable Warning System</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-4</b>	<b>23</b>	<b>SY</b>	<b>Remove &amp; Reset Brick Sidewalk</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-5</b>	<b>23</b>	<b>SY</b>	<b>Furnish &amp; Install Brick Sidewalk</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-6</b>	<b>12</b>	<b>SY</b>	<b>Remove &amp; Reset Belgian Block</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-9</b>	<b>46</b>	<b>SY</b>	<b>Furnish &amp; Install Bluestone Sidewalk</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>E-11</b>	<b>46</b>	<b>SY</b>	<b>Remove &amp; Stockpile Bluestone Sidewalk</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)

**Roadway Improvement Program 2013 #13-050  
PROPOSAL FORMS**

Item	Bid Quantity	Unit	Description
<b>F-1</b>	<b>3,738</b>	<b>SY</b>	<b>Furnish &amp; Install Loam Borrow 4" Deep</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>F-2</b>	<b>3,738</b>	<b>SY</b>	<b>Furnish &amp; Install Residential Seeding (Type 2)</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>F-3</b>	<b>127</b>	<b>CY</b>	<b>Furnish &amp; Install Stone Dust Tree Well</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)
<b>G-1</b>	<b>1</b>	<b>LS</b>	<b>Furnish &amp; Install Traffic Control Devices</b>
			\$ _____ (price in words)      \$ _____ (price in figures)      \$ _____ (total in figures)





**City of Newport**  
**Department of Public Services**  
**280 Spring Street**  
**Newport, RI 02840**

## **Limits of Work #13-050 Roadway Improvement Program 2013**

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<b>Primary Roadway</b>	<b>Limit 1</b>	<b>Limit 2</b>	<b>Comments*</b>
Vaughan Avenue	Morton Avenue	Bateman Avenue	Excavate, sidewalks
Dexter Street	Hillside Avenue	School Property	Excavate, sidewalks, coordinate with NGrid
Charles Street	Marlborough Street	Washington Square	Excavate, sidewalks, bluestone sidewalk
Dixon Street	Bellevue Avenue	Spring Street	Excavate, sidewalks
Easton's Beach Entrance	Memorial Boulevard	Memorial Boulevard	Excavate, includes removing concrete base
Ruggles Avenue	Carroll Avenue	Coggeshall Avenue	Reclaim
Ruggles Avenue	Ochre Point Avenue	First Driveway	Reclaim, coordinate with NGrid
Warner Street	Malbone Road	Pond Avenue	Excavate, sidewalk
Lowndes Street	Middleton Avenue	Annandale Road	Excavate
Brenton Road	Harrison Avenue	Wickham Road	Reclaim
Palmer Street	Old Fort Road	Dead End	Excavate
Norman Street	Old Fort Road	Palmer Street	Excavate
Stacey Street	Palmer Street	Norman Street	Excavate
Morgan Street	Harrison Avenue	Palmer Street	Excavate
Harold Street	Carroll Avenue	Old Fort Road	Excavate
Rose Street	Carroll Avenue	Old Fort Road	Excavate or Reclaim
George Street	Ruggles Avenue	Dead End	Excavate

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**Add Alternate: \*\***

Halsey Street Extension	#70 Halsey Street	North to Dead End	Excavate
Champlin Street	Eustis Avenue	Rhode Island Avenue	Reclaim
Hazard Road	Ocean Avenue	Private Driveway	Excavate

\* The comments provide a guide to the City's quantity estimates. The City will work with the Contractor if alternative methods are proposed. All proposed work will be approved by the City prior to start.

\*\* The quantities for these roadways have been included in this contract. However, the city will have to reviewed the proposals to see if there is available funding for these roads.

# CITY OF NEWPORT

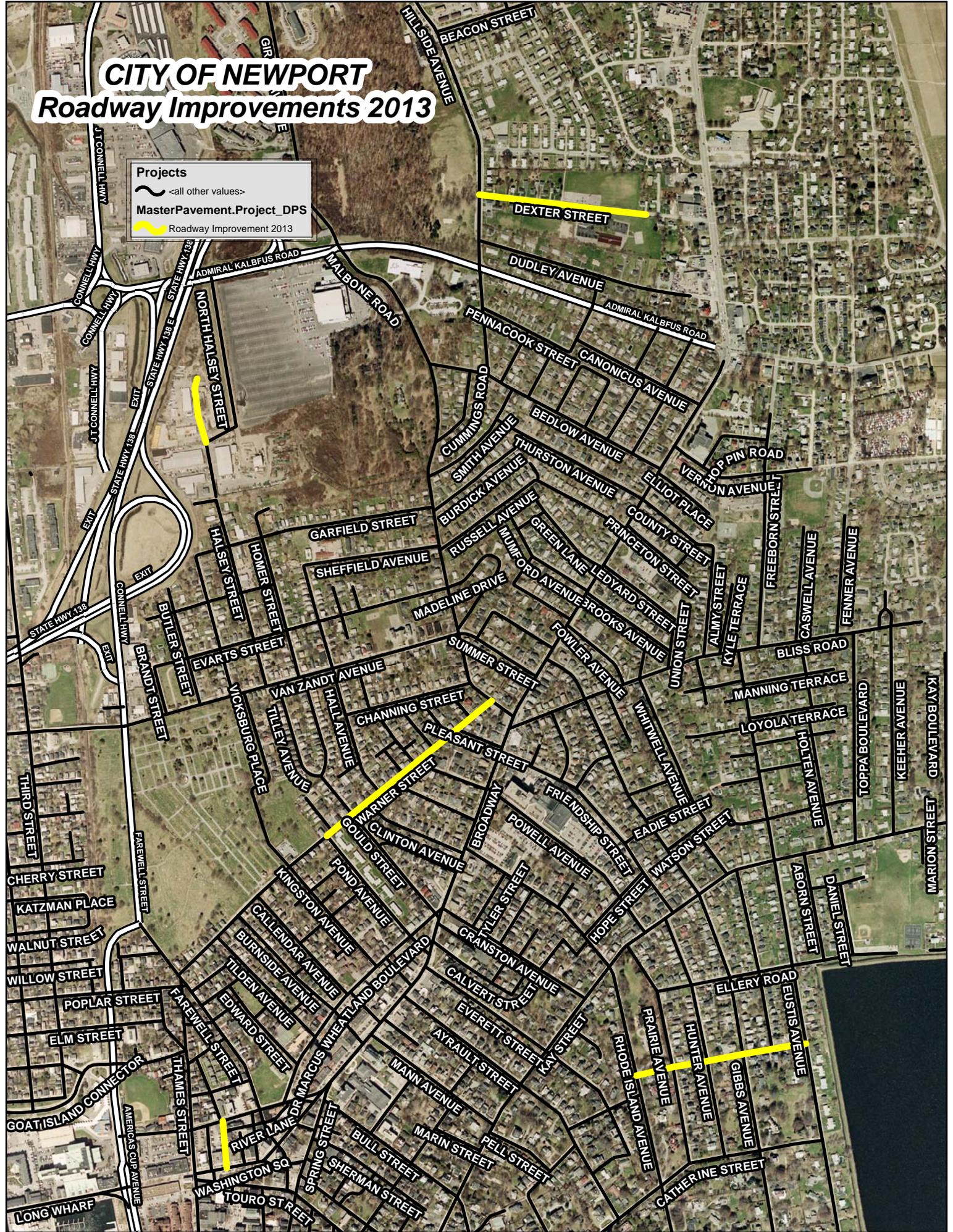
## Roadway Improvements 2013

**Projects**

 <all other values>

**MasterPavement.Project\_DPS**

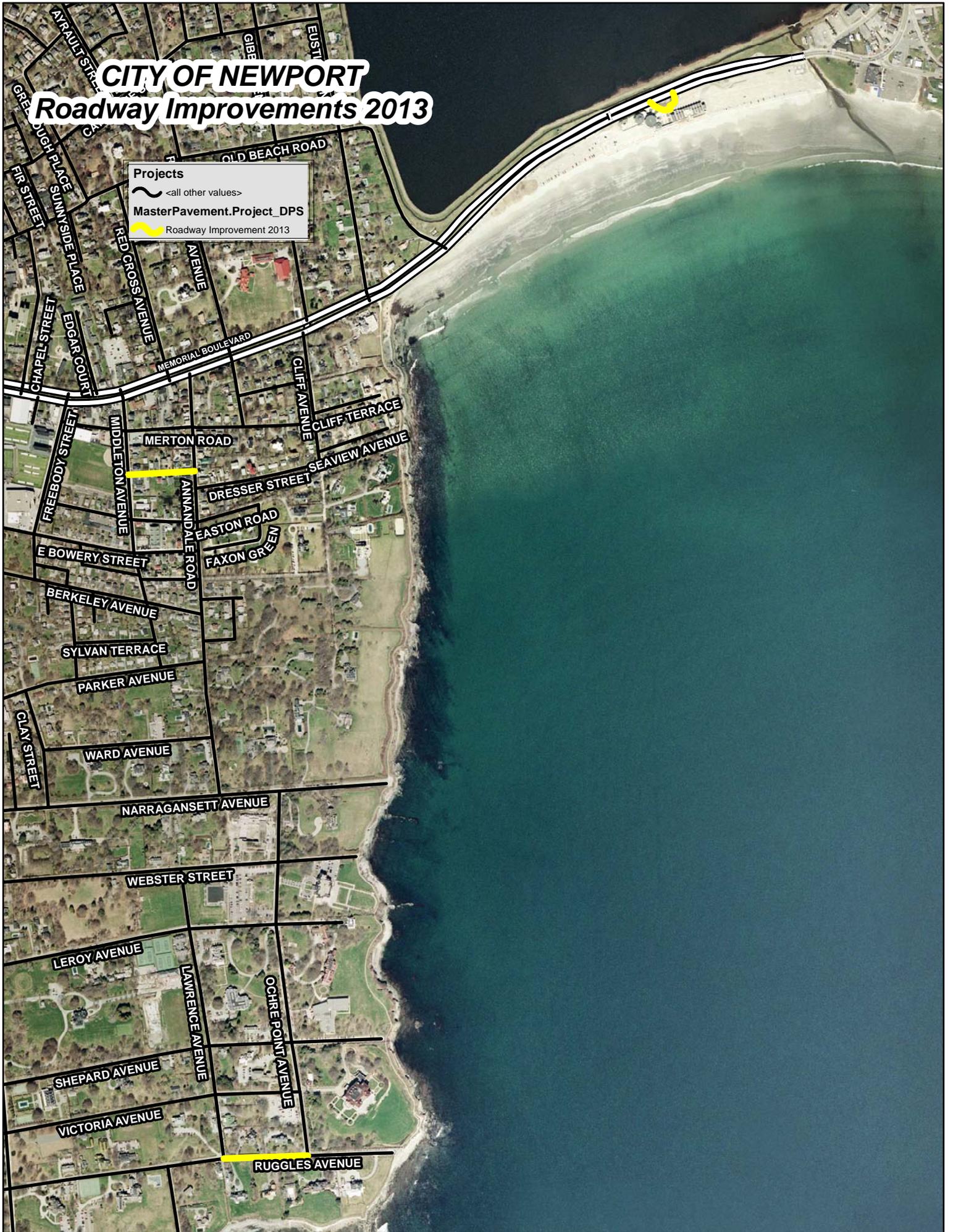
 Roadway Improvement 2013



# CITY OF NEWPORT

## Roadway Improvements 2013

**Projects**  
~ <all other values>  
**MasterPavement.Project\_DPS**  
~ Roadway Improvement 2013



# CITY OF NEWPORT

## Roadway Improvements 2013

### Projects

 <all other values>

 MasterPavement.Project\_DPS

 Roadway Improvement 2013



# **CITY OF NEWPORT**

**RHODE ISLAND**

**DEPARTMENT OF PUBLIC SERVICES**



**CITY STANDARD SPECIFICATIONS FOR  
CONSTRUCTION WITHIN CITY RIGHT-OF-WAY**

**APRIL 2013**

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## **CITY SPECIFICATIONS**

### **SECTION A – UTILITY STRUCTURES**

#### **A-1 REMOVE AND RESET FRAMES AND COVERS/GRATES**

#### **A-2 FRAME AND COVER STANDARD 6.1.1 (SQUARE)**

#### **A-3 FRAME AND COVER STANDARD 6.2.1 (ROUND)**

#### **A-4 FRAME AND GRATE STANDARD 6.3.1 (CATCH BASIN)**

### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and reset or furnish and install new roadway utility castings, at manholes and catch basins, to the new roadway elevation. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing frames, grates, and covers shall be used unless otherwise directed. New structures will be provided by the Contractor when necessary. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

All castings shall be located in the field by the Contractor prior to removal. Castings to be reused shall be marked by the Contractor to identify each cover and frame assembly and its specific location. The Contractor shall also protect the castings from damage and store them in a safe manner. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

### **MATERIALS**

All existing Frames and Covers/Grates shall be replaced where possible. Where existing Frames and Covers/Grates cannot be reused, new Frames and Covers/Grates shall meet City Specifications and corresponding specifications located within The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions (Frame and Cover/Grate Standards 6.1.1, 6.2.1, or 6.3.1). Height of frames shall be determined in the field or as directed by the Engineer. All Frames and Covers/Grates shall be of the best merchantable gray cast iron, tough, even-grained, and free from all flaws and injurious or unsightly defects. Frames and Covers/Grates shall be of neat appearance and of approved design. Castings shall be properly cleaned and coated with an asphalt varnish applied by immersion while castings are hot. Frames and Covers/Grates shall be machined to insure an even bearing in all positions. The frames shall be firmly set and bonded to the masonry at the proper grade to conform to the finished surface of the street or ground surface as otherwise directed.

Bricks used for setting castings shall be sound, hard-burned, common bricks conforming to ASTM Designation C-32, Grade MS, with all latest revisions.

Cement for masonry shall conform to the requirements of ASTM Designation C-91, Type II. Sand for the masonry mortar shall conform to ASTM Designation C-144. The mortar shall be composed of one (1) part masonry cement to 2 1/2 parts sand.

## **CONSTRUCTION METHOD**

In the event of roadway reclamation the Contractor shall saw cut or jack-hammer the pavement around castings, excavate and dispose of pavement and base material, remove manhole and catch basin frames, covers and grates, or any other casting as directed by the Engineer, prior to pulverization. Castings shall be removed in a workmanlike manner to prevent entrance of spoil, damage to the utility and unnecessary roadway excavation. All utility structures shall then be protected with steel plates of sufficient size and strength to support traffic and prevent entrance of spoil or damage to the utility. Any debris entering the utility structure that prevents flows or proper valve operation shall be immediately removed. All manholes, catch basins, and valve boxes shall be thoroughly cleaned upon final resetting of the casting. At manholes and catch basins, masonry shall be removed as required to a depth of at least 12 inches below the existing road grade prior to placing the steel plates. After plating the structure, the excavation shall be backfilled to the existing road grade with gravel, and the trench shall be maintained until reclamation. At some existing manholes, such as pre-cast concrete, the structure cannot be lowered. The Contractor shall mark all shallow manhole structures in such condition in advance of pavement pulverization or excavation. The Contractor shall remove the pavement and base material from around the casting if the pulverizing machine is not able to function to full depth due to a shallow structure.

All steel plates shall remain in place until the binder course has been placed, at which time they shall be located, excavated, the plates removed, the upper structure rebuilt, and the casting set to the proper grade.

In the event of roadway excavation or cold planning, the utility structures may be removed and reset or replaced new at any stage of construction before final top coating.

The bricks used for setting shall be laid in a workmanlike manner, true to line, and the joints shall be carefully struck and pointed on the inside. Bricks shall be thoroughly wet when laid and each brick shall be laid in mortar so as to form full bed, end and side joints in one operation. The outside of the brickwork for stacks shall be neatly plastered with a 1/2-inch layer of cement mortar as the work progresses. The brickwork shall be satisfactorily bonded to the concrete and frame.

After each catch basin is rebuilt or modified, processed gravel shall be placed and mechanically compacted around it, matching the grade of the existing gravel base. Each structure shall then be restored with the previously existing material, to match, or as otherwise directed by the Engineer. If within sidewalk, concrete shall be poured at the same time as the sidewalk with the same specifications as such. Each structure shall be isolated with expansion joints to prevent sidewalk damage if repairs are later necessary.

## **METHOD OF MEASUREMENT**

Frames and Covers/Grates of the various types and sizes will be measured on a "Per Each" basis by the number of such drainage structures actually removed and reset in accordance with the Plans and/or as directed by the Engineer. Any structures that require new Frames and Covers/Grates will be measured under their respective item, also on a "Per Each" basis by the number of such drainage structures actually removed and reset new.

## **BASIS OF PAYMENT**

Remove and Reset and New Frames and Covers/Grates shall be paid for at the respective contract unit prices "Per Each" structure as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, plating, placement and compaction of backfill, masonry work, locking the castings in place, the legal disposal of all surplus excavated and/or unsuitable material and unusable Frames and Covers/Grates, cleaning the structure, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

## **CITY SPECIFICATIONS**

### **SECTION A – UTILITY STRUCTURES**

#### **A-5 MODIFY CATCH BASIN/VERTICAL WALLS**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and dispose broken or otherwise unacceptable catch basin drop or sump structures and rebuild such structures. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing materials shall be discarded and new brick or other approved materials shall be used as directed. New materials will be provided by the Contractor. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

All utility castings shall be located in the field by the Contractor prior to removal. Castings to be reused shall be marked by the Contractor to identify each cover and frame assembly and its specific location. The Contractor shall also protect the castings from damage and store them in a safe manner. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

##### **MATERIALS**

New brick used for rebuilding walls and setting castings shall be sound, hard-burned, common bricks conforming to ASTM Designation C-32, Grade MS, latest revision.

Cement for masonry shall conform to the requirements of ASTM Designation C-91, Type II. Sand for the masonry mortar shall conform to ASTM Designation C-144. The mortar shall be composed of one (1) part masonry cement to 2 1/2 parts sand.

Steel plates for the catch basins shall be 1/2-inch thick with welded steel gussets for reinforcement and to support the new frame and cover. The frame and cover shall be centered over an opening cut to match the diameter of the cover. All steel shall conform to RIDOT Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, Section M.05.04, Structural Steel. Prior to setting the roof in place, the Contractor shall rebuild or reconstruct catch basin walls so as to properly support the new roof.

##### **CONSTRUCTION METHOD**

Each catch basin drop inlet or sump structure shall be completely removed of defect brick/mortar material to a point where structurally sound material is apparent or as otherwise directed by the Engineer. At which point all removed material will be disposed of. If a structure is removed in its entirety, the new structure to be built shall be placed on a mechanically compacted crushed processed gravel base of at least 6 inches, or approved equal.

The bricks used for setting shall be laid in a workmanlike manner, true to line, and the joints shall be carefully struck and pointed on the inside. Bricks shall be thoroughly wet when laid and each brick shall be laid in mortar so as to form full bed, end and side joints in one operation. The outside of the brickwork for stacks shall be neatly plastered with a 1/2-inch layer of cement mortar as the work progresses. The brick work shall be satisfactorily bonded to the concrete and frame.

After each catch basin is rebuilt or modified, processed gravel shall be placed and mechanically compacted around it, matching the grade of the existing gravel base. Each structure shall then be restored with the previously existing material, to match, or as otherwise directed by the Engineer. If within sidewalk, concrete shall be poured at the same time as the sidewalk with the same specifications as such. Each structure shall be isolated with expansion joints to prevent sidewalk damage if repairs are later necessary.

### **METHOD OF MEASUREMENT**

Modify Catch Basin/Vertical Walls will be measured on a "Per Each" basis by the number of such structures actually removed and rebuilt in accordance with the Plans and/or as directed by the Engineer. Any structures that require new Frames and Covers/Grates will be measured under their respective item also on a "Per Each" basis by the number of such drainage structures actually removed and reset or replaced new.

### **BASIS OF PAYMENT**

Modify Catch Basin/Vertical Walls shall be paid for at the respective contract unit prices "Per Each" structure as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, plating, placement and compaction of backfill, masonry work, locking the casting in place, the legal disposal of all surplus excavated and/or unsuitable material and unusable Frames and Covers/Grates, cleaning the structure, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION A – UTILITY STRUCTURES**

#### **A-6 PRECAST CONCRETE DROP INLET STANDARD 4.5.0**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and dispose broken or otherwise unacceptable catch basin drop inlets and furnish and install new precast concrete drop inlet standard 4.5.0. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing materials shall be discarded and new brick or other approved materials shall be used as directed. New materials will be provided by the Contractor. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

All utility castings shall be located in the field by the Contractor prior to removal. Castings to be reused shall be marked by the Contractor to identify each cover and frame assembly and its specific location. The Contractor shall also protect the castings from damage and store them in a safe manner. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

##### **MATERIALS**

Existing or new catch basin castings shall be centered over the drop inlet and adjusted to the proper roadway elevation using mortared brick.

New brick used for setting castings shall be sound, hard-burned, common bricks conforming to ASTM Designation C-32, Grade MS, latest revision.

Steel plates for the catch basins shall be ½-inch thick with welded steel gussets for reinforcement and to support the new frame and cover. The frame and cover shall be centered over an opening cut to match the diameter of the cover. All steel shall conform to RIDOT Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, Section M.05.04, Structural Steel. Prior to setting the roof in place, the Contractor shall rebuild or reconstruct catch basin walls so as to properly support the new roof.

##### **CONSTRUCTION METHOD**

Each catch basin drop inlet or shall be completely removed or as otherwise directed by the Engineer. All removed material will be disposed of at the expense of the Contractor. The new precast concrete drop inlet structure shall be placed on a mechanically compacted crushed processed gravel base of at least 6 inches, or approved equal.

The bricks used for setting shall be laid in a workmanlike manner, true to line, and the joints shall be carefully struck and pointed on the inside. Bricks shall be thoroughly wet when laid and each brick shall be laid in mortar so as to form full bed, end and side joints in one operation.

The outside of the brickwork for stacks shall be neatly plastered with a 1/2-inch layer of cement mortar as the work progresses. The brick work shall be satisfactorily bonded to the concrete and frame. Cement for masonry shall conform to the requirements of ASTM Designation C-91, Type II. Sand for the masonry mortar shall conform to ASTM Designation C-144. The mortar shall be composed of one (1) part masonry cement to 2 1/2 parts sand.

After each catch basin drop inlet is installed, processed gravel shall be placed and mechanically compacted around it, matching the grade of the existing gravel base. Each structure shall then be restored with the previously existing material, to match, or as otherwise directed by the Engineer.

### **METHOD OF MEASUREMENT**

Precast Concrete Drop Inlet Standard 4.5.0 will be measured on a "Per Each" basis by the number of such structures actually removed and installed new in accordance with the Plans and/or as directed by the Engineer. Any structures that require new Frames and Covers/Grates will be measured under their respective item also on a "Per Each" basis by the number of such drainage structures actually removed and reset or replaced new.

### **BASIS OF PAYMENT**

Precast Concrete Drop Inlet Standard 4.5.0 shall be paid for at the respective contract unit prices "Per Each" structure as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, plating, placement and compaction of backfill, precast concrete structures, masonry work, locking the casting in place, the legal disposal of all surplus excavated and/or unsuitable material and unusable Frames and Covers/Grates, cleaning the structure, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION A – UTILITY STRUCTURES**

#### **A-7 REMOVE AND RESET ROADWAY SERVICE GATE BOX**

#### **A-8 FURNISH AND INSTALL ROADWAY SERVICE GATE BOX**

#### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and reset or furnish and install new Roadway Service Gate Boxes, at gas and water shut off/clean out locations, to the new roadway elevation. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing Roadway Service Gate Boxes shall be used unless otherwise directed. New structures will be provided by the Contractor when necessary. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

All castings shall be located in the field by the Contractor prior to removal. Castings to be reused shall be marked by the Contractor to identify each cover and frame assembly and its specific location. The Contractor shall also protect the castings from damage and store them in a safe manner. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

#### **MATERIALS**

All existing Roadway Service Gate Boxes shall be replaced where possible. Where existing Roadway Service Gate Boxes cannot be reused, new service boxes shall meet City Specifications and corresponding specifications located within The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. All Roadway Service Gate Boxes shall be of the best merchantable gray cast iron, tough, even-grained, and free from all flaws and injurious or unsightly defects. Roadway Service Gate Boxes shall be of neat appearance and of approved design. Castings shall be properly cleaned and coated with an asphalt varnish applied by immersion while castings are hot. Roadway Service Gate Boxes shall be machined to insure an even bearing in all positions.

Cement for masonry shall conform to the requirements of ASTM Designation C-91, Type II. Sand for the masonry mortar shall conform to ASTM Designation C-144. The mortar shall be composed of one (1) part masonry cement to 2 1/2 parts sand.

#### **CONSTRUCTION METHOD**

In the event of roadway reclamation the Contractor shall saw cut or jack-hammer the pavement around castings, excavate and dispose of pavement and base material, remove Roadway Service Gate Boxes or any other casting as directed by the Engineer, prior to pulverization. Castings shall be removed in a workmanlike manner to prevent entrance of spoil, damage to the utility and unnecessary roadway excavation. All utility structures shall then be protected with steel plates of sufficient size and strength to support traffic and prevent entrance of spoil

or damage to the utility. Any debris entering the utility structure that prevents flows or proper valve operation shall be immediately removed. All valve boxes shall be thoroughly cleaned upon final resetting of the casting. After plating the structure, the excavation shall be backfilled to the existing road grade with gravel, and the trench shall be maintained until reclamation. At locations where utility structures cannot be lowered, the Contractor shall mark structures in such condition in advance of pavement pulverization or excavation. The Contractor shall remove the pavement and base material from around the casting if the pulverizing machine is not able to function to full depth due to a shallow structure.

All steel plates shall remain in place until the binder course has been placed, at which time they shall be located, excavated, the plates removed, and the casting set to the proper grade.

In the event of roadway excavation or cold planning, the utility structures may be removed and reset or replaced new at any stage of construction before final top coating.

Each structure shall be excavated so that the top sleeve casting can be removed or adjusted. The service boxes shall be firmly set at the proper grade to conform to the finished surface of the street or ground surface or as otherwise directed by the Engineer.

After each catch casting is set, processed gravel shall be placed and mechanically compacted around it, matching the grade of the existing gravel base. Each structure shall then be restored with the previously existing material, to match, or as otherwise directed by the Engineer.

## **METHOD OF MEASUREMENT**

Roadway Service Gate Boxes will be measured on a "Per Each" basis by the number of such structures actually removed and reset in accordance with the Plans and/or as directed by the Engineer. Any structures that require new Roadway Service Gate Boxes will be measured under their respective item, also on a "Per Each" basis by the number of such structures actually removed, furnished, and installed new. If the City provides the Contractor with new Roadway Service Gate Boxes, these structures will be measured on a "Per Each" basis by the number of such structures actually removed and reset in the field.

## **BASIS OF PAYMENT**

Remove and Reset and New Roadway Service Gate Boxes shall be paid for at the respective contract unit prices "Per Each" structure as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, plating, placement and compaction of backfill, locking the casting in place, the legal disposal of all surplus excavated and/or unsuitable material and unusable structures, cleaning the structure, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

## **CITY SPECIFICATIONS**

### **SECTION A – UTILITY STRUCTURES**

#### **A-9 REMOVE AND RESET ROADWAY SERVICE GATE BOX A-10 FURNISH AND INSTALL ROADWAY SERVICE GATE BOX**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and reset or furnish and install new Roadway Service Gate Boxes, at gas and water shut off/clean out locations, to the new roadway elevation. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing Roadway Service Gate Boxes shall be used unless otherwise directed. New structures will be provided by the Contractor when necessary. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

All castings shall be located in the field by the Contractor prior to removal. Castings to be reused shall be marked by the Contractor to identify each cover and frame assembly and its specific location. The Contractor shall also protect the castings from damage and store them in a safe manner. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

##### **MATERIALS**

All existing Roadway Service Gate Boxes shall be replaced where possible. Where existing Roadway Service Gate Boxes cannot be reused, new service boxes shall meet City Specifications and corresponding specifications located within The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. All Roadway Service Gate Boxes shall be of the best merchantable gray cast iron, tough, even-grained, and free from all flaws and injurious or unsightly defects. Roadway Service Gate Boxes shall be of neat appearance and of approved design. Castings shall be properly cleaned and coated with an asphalt varnish applied by immersion while castings are hot. Roadway Service Gate Boxes shall be machined to insure an even bearing in all positions.

##### **CONSTRUCTION METHOD**

In the event of roadway reclamation the Contractor shall saw cut or jack-hammer the pavement around castings, excavate and dispose of pavement and base material, remove Roadway Service Gate Boxes or any other casting as directed by the Engineer, prior to pulverization. Castings shall be removed in a workmanlike manner to prevent entrance of spoil, damage to the utility and unnecessary roadway excavation. All utility structures shall then be protected with steel plates of sufficient size and strength to support traffic and prevent entrance of spoil or damage to the utility. Any debris entering the utility structure that prevents flows or proper valve operation shall be immediately removed. All valve boxes shall be thoroughly cleaned upon final resetting of the casting. After plating the structure, the excavation shall be backfilled to the existing road grade with gravel, and the trench shall be maintained until reclamation. At

locations where utility structures cannot be lowered, the Contractor shall mark structures in such condition in advance of pavement pulverization or excavation. The Contractor shall remove the pavement and base material from around the casting if the pulverizing machine is not able to function to full depth due to a shallow structure.

All steel plates shall remain in place until the binder course has been placed, at which time they shall be located, excavated, the plates removed, and the casting set to the proper grade.

In the event of roadway excavation or cold planning, the utility structures may be removed and reset or replaced new at any stage of construction before final top coating.

Each structure shall be excavated so that the top sleeve casting can be removed or adjusted. The service boxes shall be firmly set at the proper grade to conform to the finished surface of the street or ground surface or as otherwise directed by the Engineer.

After each catch casting is set, processed gravel shall be placed and mechanically compacted around it, matching the grade of the existing gravel base. Each structure shall then be restored with the previously existing material, to match, or as otherwise directed by the Engineer.

#### **METHOD OF MEASUREMENT**

Roadway Service Gate Boxes will be measured on a "Per Each" basis by the number of such structures actually removed and reset in accordance with the Plans and/or as directed by the Engineer. Any structures that require new Roadway Service Gate Boxes will be measured under their respective item, also on a "Per Each" basis by the number of such structures actually removed, furnished, and installed new. If the City provides the Contractor with new Roadway Service Gate Boxes, these structures will be measured on a "Per Each" basis by the number of such structures actually removed and reset in the field.

#### **BASIS OF PAYMENT**

Remove and Reset and New Roadway Service Gate Boxes shall be paid for at the respective contract unit prices "Per Each" structure as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, plating, placement and compaction of backfill, locking the casting in place, the legal disposal of all surplus excavated and/or unsuitable material and unusable structures, cleaning the structure, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-1 PAVEMENT RECLAMATION**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to pulverize in place the existing bituminous pavement and underlying material, rough grade, and compact the new road base. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

No reclamation shall begin until all structures and boxes are lowered and adequately protected as specified within these Specifications. All paving limits shall be saw cut full depth.

##### **CONSTRUCTION METHOD**

The Contractor shall furnish all labor, materials, tools and equipment necessary to perform the work of this item, including removing all roadway utility castings at manholes, catch basins and service boxes, or otherwise protecting these utilities during the milling process. The work shall consist of pulverizing the existing pavement and underlying base material into processed asphalt stabilized base (recycled) course and providing adequate traffic control devices during construction. The actual depth of reclamation shall be determined in the field by the Engineer. This mixture of pavement and base is to be processed, blended, and reshaped in accordance with these specifications and/or as otherwise directed by the Engineer.

Reclamation shall be by means of a traveling rotary reclaimer capable of cutting through existing asphalt and pulverization of depths of up to 12 inches with one pass. The machine shall be self-propelled and equipped with an adjustable grading blade, leaving its path generally smooth for traffic. Equipment such as rear mounted ripper crushers, road planers or cold milling machines designed to mill or shred the existing bituminous pavement rather than crush and fracture it, are not considered capable of achieving specification gradation. This machine is not intended for use on sub-bases with large boulders or ledge. If such unsuitable material is found, pulverization will stop. No payment for reclamation shall be made where the roadway is not pulverized. Areas where Cobblestones or Belgian Blocks are located in the roadway shall be handled under their respective items.

Under reclamation, the existing bituminous concrete and base material must be pulverized and mixed so as to form a homogenous mass of uniformly processed base material that will bond together when compacted.

All pulverized material shall pass the 3" sieve. The processed base shall meet the following gradation:

Sieve Designation	% Passing by Weight
3"	100
1 1/2"	70-100
3/4"	50-85
#4	30-65
#50	8-24
#200	0-10

A grain size distribution test of the pulverized material shall be furnished upon request of the Engineer.

Immediately following pulverization, the road shall be Rough graded and mechanically compacted. The Contractor shall reclaim only that area of roadway that can be processed and mechanically compacted by the end of the same work day, at which time it must be open to traffic, with the City's approval.

Water and calcium chloride shall be added to insure optimum moisture content at time of compaction. They shall be applied at the rate of 0.25 pounds of calcium chloride per gallon of water per square yard of recycled pavement area. The mixing formula may be modified by the Engineer to compensate for temperature, humidity, weather and/or density determinations.

The calcium chloride solution provided shall be manufactured as a true solution and shall not be reconstituted from flake calcium chloride. The calcium shall meet the following material specifications (see ASTM Designation D98; AASHTO-M144).

Calcium Chloride:	35% ± 1%
Alkali Chloride as NaCl:	2% max.
Magnesium as MgCl:	0.1%

Typical (in lbs. Per gallon)

Calcium Chloride	5.050
Sodium Chloride	0.200
Magnesium Chloride	0.004
Calcium Sulfate	0.004
Water	6.002
 Total	 11.26

The distributor for the liquid calcium chloride shall be capable of applying it in accurately measured quantities at any rate between 0.1 to 2.0 gallons per square yard of roadway surface, at any length of spray bar up to 20 feet. The distributor shall be capable of maintaining a uniform rate of distribution of material regardless of changes in road grade, width or direction. The distributor shall be equipped with a digital volumetric accumulator capable of measuring

gallons applied and distance traveled. The volume and measuring device shall be equipped with a power unit for the pump so that the application is by pressure, not by gravity. The spray nozzles and pressure system shall provide a sufficient and uniform fan shaped spray of material throughout the entire length of the spray bar at all times while in operation, and shall be adjustable laterally and vertically. The spray shall completely cover the roadway surface receiving treatment.

The payment for liquid calcium chloride shall be included in the cost for this item Pavement Reclamation.

### **METHOD OF MEASUREMENT**

Pavement Reclamation will be measured on a "Per Square Yard" basis by the amount of roadway material actually pulverized in accordance with the Plans and/or as directed by the Engineer.

### **BASIS OF PAYMENT**

Pavement Reclamation shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) pulverizing, spraying liquid calcium chloride, mixing, blending, spreading, loading, hauling, rough grading, and compacting the new road base, legal disposal of all materials, clean-up, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any damage due to carelessness shall be the Contractor's responsibility.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-2 COLD PLANING**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to mill in-place the existing bituminous pavement. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

It will be the Contractors responsibility to remove all milling from the work site and dispose of legally.

##### **CONSTRUCTION METHOD**

The Contractor shall furnish all labor, materials, tools and equipment necessary to perform the work of this item, including removing all roadway utility castings at manholes, catch basins and service boxes, or otherwise protecting these utilities during the milling process. This work shall consist of cold planing (milling) the existing roadway to a depth of two (2) inches over the majority of the roadway. However, the depth of cold planing will extend to three (3) inches at the gutter lines, matching the two inch depth a minimum of four feet from the gutter line, unless otherwise specified within the Contract Documents or directed by the Engineer. The work also includes cleaning and sweeping, resetting or replacing manhole frames and covers/grates, water and gas service boxes, applying asphalt emulsion tack coat, and providing adequate traffic control devices during construction.

A tack coat shall be required on the cold planed surface immediately prior to installation of the bituminous surface course. The tack coat shall be applied by mechanical means at a rate specified by the manufacturer and as directed by the Engineer. Tack coat shall also be applied to all vertical surfaces including but not limited to pavement limit sawed lines, curb lines, utility castings, and any other vertical surfaces that the top coat of pavement will be placed adjacent to.

##### **METHOD OF MEASUREMENT**

Cold Planing will be measured on a "Per Square Yard" basis by the amount of roadway material actually removed and disposed of in accordance with the Plans and/or as directed by the Engineer.

## **BASIS OF PAYMENT**

Cold Planing shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) milling, loading, movement and hauling, legal disposal of all materials, clean-up, sweeping, asphalt emulsion tack coat, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any damage due to carelessness shall be the Contractor's responsibility.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-3 ROADWAY EXCAVATION**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to remove and dispose of the existing bituminous flexible pavement and underlying material as directed by the Engineer. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

The Contractor shall be responsible for all costs associated with excavating, loading, movement and hauling, rough grading, and compacting the new road base, legal disposal of all materials, clean-up, and any other incidentals associated with the work complete and accepted by the Engineer.

##### **CONSTRUCTION METHOD**

The Contractor shall furnish all labor, materials, tools and equipment necessary to perform the work of this item, including removing and disposing of all existing bituminous concrete pavements and underlying base material as directed by the Engineer. Generally, total depth of excavation will not exceed 12 inches. The Contractor shall be responsible for locating and securing a legal disposal site. The City of Newport has no landfill site available. The Contractor shall remove and dispose of any unsuitable material at locations as directed by the Engineer and backfill with Crushed Processed Gravel or stockpiled reclaimed Excess Material as directed by the Engineer. These items will be paid for under their respective unit prices. The roadway shall be reshaped, rough graded, and mechanically compacted in accordance with these specifications and/or as directed by the Engineer.

##### **METHOD OF MEASUREMENT**

Roadway Excavation will be measured on a "Per Cubic Yard" basis by the amount of roadway material actually removed in accordance with the Plans and/or as directed by the Engineer.

##### **BASIS OF PAYMENT**

Roadway Excavation shall be paid for at the respective contract unit prices "Per Cubic Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, hauling, loading, rough grading, and compacting the new road base, legal disposal of all materials, clean-up, and all other incidentals required to finish the work, complete and accepted by the Engineer. Furnish and Install Crushed Processed Gravel and Installation of Excess Material will

not be included in this item and will be paid by their respective Contract unit prices. Any damage due to carelessness shall be the Contractor's responsibility.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-4 REMOVE AND STOCKPILE EXCESS MATERIAL**

#### **B-5 REMOVE AND DISPOSE UNSUITABLE MATERIAL**

#### **B-6 REMOVE AND DISPOSE COBBLESTONES**

#### **B-7 REMOVE AND DISPOSE CONCRETE ROAD BASE**

#### **B-8 REMOVE AND STOCKPILE BELGIAN BLOCKS**

### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Remove and Stockpile any Belgian Blocks and pulverized Material deemed as Excess by the City or dispose of any Material deemed as Unsuitable by the City, Cobblestones, and Concrete Road Base. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing material shall be used unless otherwise directed. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

### **MATERIALS**

The Contractor shall be responsible for all costs associated with excavation, loading, movement and hauling, unloading, placement, disposal, clean-up and any other incidentals associated with the work complete and accepted by the Engineer. The Contractor shall be responsible for contact and communication with City Yard Employees when stockpiling material.

### **CONSTRUCTION METHOD**

Excess Reclaim Material deemed as such by the City, shall be excavated, removed and stockpiled, by the Contractor, at the City Yard 80 Halsey Street, Newport, RI 02840.

Some roads may contain Belgian Block granite pavers just below the existing asphalt. These various materials shall be excavated, removed and stockpiled at the City Yard 80 Halsey Street, Newport, RI 02840. The Contractor then shall backfill the excavation with Excess Material or Crushed Processed Gravel, or as otherwise directed by the Engineer.

Some roads may contain round Cobblestones, Concrete Road Base, or other Unsuitable Materials (deeded so by the City) typically just below the existing asphalt. These various materials shall be excavated, removed and disposed of. The Contractor shall be responsible for locating and securing a disposal site. The Contractor then shall backfill the excavation with Excess Material or Crushed Processed Gravel, or as otherwise directed by the Engineer.

### **METHOD OF MEASUREMENT**

Removal and Disposal of Unsuitable Material and Concrete Road Base and the Removal and Stockpiling of Excess Material will be measured on a "Per Cubic Yard" basis by the amount of roadway material actually removed and disposed of or stockpiled in accordance with the Plans

and/or as directed by the Engineer. Removal and Disposal of Cobblestones and the Removal and Stockpiling of Belgian Blocks will be measured on a "Per Square Yard" in place basis by the amount of roadway material actually removed and disposed of or stockpiled in accordance with the Plans and/or as directed by the Engineer.

### **BASIS OF PAYMENT**

Removal and Disposal of Unsuitable Material and Concrete Road Base and the Removal and Stockpiling of Excess Material shall be paid for at the respective contract unit prices "Per Cubic Yard" as listed in the Proposal. Removal and Disposal of Cobblestones and the Removal and Stockpiling of Belgian Blocks shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, loading, movement and hauling, unloading, placement, clean-up, legal disposal of all materials, and all other incidentals required to finish the work, complete and accepted by the Engineer. Crushed processed gravel will be paid for under its respective unit price "Per Cubic Yard". Any damage due to carelessness shall be the Contractor's responsibility.

## CITY SPECIFICATIONS

### SECTION B – SITE WORK

#### B-9 FURNISH AND INSTALL GEOGRID

##### DESCRIPTION

The Contractor shall furnish all labor, materials, tools, and equipment necessary to furnish and install Tensar® TriAx® TX140 Geogrid (or approved equal) to all manufacturers' specifications. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

##### MATERIALS

Geo-Textile material to be installed shall be Tensar® TriAx® TX140 Geogrid (or approved equal) as directed by the Engineer.

Geo-Textile material shall meet these minimum requirements:

<b>Index Properties</b>	<b>Longitudinal</b>	<b>Diagonal</b>	<b>Transverse</b>	<b>General</b>
Rib pitch, mm (in)	40 (1.60)	40 (1.60)		rectangular
Mid-rib depth, mm (in)		1.2 (0.05)	1.2 (0.05)	triangular
Mid-rib width, mm (in)		1.1 (0.04)	1.1 (0.04)	
Rib shape				
Aperture shape				
<b>Structural Integrity</b>				
Junction efficiency, %				93
Aperture stability. Kg-cm/deg @ 5.0kg-cm				3.0
Radial Stiffness at low strain, kN/m @ 0.5% strain (lb/ft @ 0.5% strain)				(15,430)
<b>Durability</b>				
Resistance to chemical degradation				100%
Resistance to ultra-violet light and weathering				100%

All existing base material shall be reused unless otherwise directed by the Engineer. Where existing material cannot be reused, the Contractor shall remove such Unsuitable Material and replace with either Crushed Processed Gravel or other Excess Material as directed. Any new material shall meet City Specifications and corresponding specifications located within The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

## **CONSTRUCTION METHOD**

After the top course of asphalt, and all oddities (concrete road base, cobblestones, Belgian blocks, etc.), have been removed, the Contractor shall excavate to a depth of 10 inches below the final top grade of the new roadway elevation. After which the Contractor shall then install the Geo-Textile material to all manufacturers' specifications. The contractor shall then backfill to a depth of six inches with in situ material, Excess Material, or Crushed Processed Gravel as directed by the Engineer.

## **METHOD OF MEASUREMENT**

Furnish and Install Geogrid will be measured on a "Per Square Yard" basis by the amount of Geogrid material actually installed in accordance with the Plans and/or as directed by the Engineer. Any extra work associated with this item including Removal and Disposal of Unsuitable Material, Removal and Stockpile of Excess Material, Furnish and Installation of Crushed Processed Gravel, and Installation of Excess Material shall be measured on a "Per Cubic Yard" basis by the amount of such material actually removed, disposed, stockpiled, furnished, or installed in accordance with the Plans and/or as directed by the Engineer.

## **BASIS OF PAYMENT**

Furnish and Install Geogrid shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation, installation, placement of backfill, the legal disposal of all surplus excavated and/or unsuitable material and unusable structures, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-10 FURNISH AND INSTALL CRUSHED PROCESSED GRAVEL**

#### **B-11 INSTALLATION OF EXCESS MATERIAL**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Crushed Processed Gravel or Install Excess Material. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Existing material shall be used unless otherwise directed. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

All gravel shall be of hard, durable stone, and well graded. It shall, in general, be as specified by the Standard Specifications for Road and Bridge Construction of the State of Rhode Island, amended December 2010 with all latest revisions, Item M.01.09, Section 300. No segregation of large or fine particles will be allowed, but the gravel, as spread, shall be well graded with no pockets of fine material.

Crushed gravel shall meet the following gradation requirements:

Sieve Size	% Passing
2-inch	100
3/4 inch	50-80
#4	30-50
#200	0-5

All gravel shall be plant processed, crushed and washed, and yellow or brown in color. Gravel shall not be gray or black in color.

The Contractor shall be responsible for all costs associated with loading, movement and hauling, unloading, placement, clean-up and any other incidentals associated with the work complete and accepted by the Engineer. The Contractor shall be responsible for contact and communication with City Yard Employees when using stockpiled material.

##### **CONSTRUCTION METHOD**

The gravel shall be spread, tamped, and filled in separate layers not to exceed lifts of six inches in depth. Heavy tampers shall be used to consolidate the material.

The relative compaction of each layer of base material shall not be less than 95% of the maximum density determined in accordance with AASHTO T180. The surface of the finished

base course shall not vary more than one inch above or below the grade established by the Engineer. No plus or minus deviation may continue for more than 100 feet in any direction.

The finished gravel base course shall not be disturbed by traffic or other operations and shall be maintained by the Contractor in a satisfactory condition until bituminous concrete pavement, Portland cement concrete, or curb is placed. The storage or stockpiling of materials on the finished base course will not be permitted.

If the gravel is so dry as not to consolidate satisfactorily, the Engineer may order the addition of sufficient water to secure satisfactory compaction and the cost thereof shall be included in the price bid.

Excess Reclaim Material deeded as such by the City, shall be loaded and hauled from stockpile by the Contractor, at the City Yard 80 Halsey Street, Newport, RI 02840 and placed on site as gravel fill.

### **METHOD OF MEASUREMENT**

Furnish and Install Crushed Processed Gravel or Install Excess Material will be measured on a "Per Cubic Yard" basis by the amount of roadway material actually installed in accordance with the Plans and/or as directed by the Engineer.

### **BASIS OF PAYMENT**

Furnish and Install Crushed Processed Gravel or Install Excess Material shall be paid for at the respective contract unit prices "Per Cubic Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) loading, movement and hauling, unloading, placement, clean-up, legal disposal of all materials, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any damage due to carelessness shall be the Contractor's responsibility.

## **CITY SPECIFICATIONS**

### **SECTION B – SITE WORK**

#### **B-12 FINE GRADING AND COMPACTION**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Fine Grade and Compact all base material to lines and grades as directed by the Engineer. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

A motorized grader shall be used for fine grading and hand trimming shall be performed where the grader cannot pass. A vibratory roller shall be used for compacting the finished road base to a dense consolidated mass. Rollers shall have a compacting width of not less than five feet and a gross weight of not less than ten tons. All large rocks and other unsatisfactory material shall be removed prior to compaction.

##### **CONSTRUCTION METHOD**

The finished surface shall be tested for smoothness and accuracy of grade and if any portions are found to lack the required smoothness or accuracy, such portions shall be re-graded, re-compacted, and otherwise manipulated as directed by the Engineer until the required smoothness and accuracy are obtained. The finished surface shall be such that it will not vary more than one quarter of an inch from a ten foot straight edge applied to the surface, parallel to or at right angles to the center line.

If the gravel is so dry as not to consolidate satisfactorily, the Engineer may order the addition of sufficient water to secure satisfactory compaction and the cost thereof shall be included in the price bid.

Roadway crown shall be centered between both curb lines and shall have a slope of two (2) percent meeting the curb in a manner that creates a six inch reveal, unless otherwise directed by the Engineer. The roadway shall also be graded as to take into account the locations of manholes, catch basins, inlet stones, and any other utility structures.

##### **METHOD OF MEASUREMENT**

Fine Grading and Compaction will be measured on a "Per Square Yard" basis by the area of roadway base material actually graded and mechanically compacted in accordance with the Plans and/or as directed by the Engineer.

## **BASIS OF PAYMENT**

Fine Grading and Compaction shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) grading, loading, movement and hauling, unloading, placement, compaction, clean-up, legal disposal of all materials, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any damage due to carelessness shall be the Contractor's responsibility.

## **CITY SPECIFICATIONS**

### **SECTION C – BITUMINOUS CONCRETE PAVEMENT**

#### **C-1 FURNISH AND INSTALL BITUMINOUS CONCRETE BINDER COURSE**

#### **C-2 FURNISH AND INSTALL BITUMINOUS CONCRETE TOP COURSE CLASS I-1**

#### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Bituminous Concrete Binder Course and Bituminous Concrete Top Course Class I-1. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

#### **MATERIALS**

The specific pavement mixes are designated by the column headings of the table that constitutes Subsection M.03.01 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. They are: Base Course, Surface Course; Class I-1, and Asphalt Emulsion Tack Coat

Aggregates for bituminous pavements shall meet the following applicable requirements:

Coarse aggregate (retained on the No. 8 sieve) shall be crushed stone, or crushed or natural gravel, and, unless otherwise stipulated, shall conform to the respective requirements of Subsections M.01.05, M.01.10 and M.01.11 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions Section 400.

Fine aggregate shall consist of sand, stone screenings or a mixture of sand and stone screenings. Stone screenings and sands shall be free from dirt, clay, organic matter, excess fines or other deleterious materials. Fine aggregates shall conform to the quality requirements of AASHTO M29. Fine aggregate shall be of such gradation that when proportionally combined with other required aggregate fractions, the resultant mixture will meet the gradation required under the composition of mixture for the specified class.

Filler material for use in asphalt mixtures shall conform to the requirements of AASHTO M17.

Hydrated lime shall conform to the latest requirements of ASTM C207, Type N

The grade of bituminous material shall be as specified in Subsection M.03.02.1 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions Section 400. Viscosity graded AC-20 shall be used in all non-recycled paving mixtures, unless otherwise approved by the City. A certificate of analysis for asphalt cement may be required at the point of distribution. Samples may be taken at the plant and tested by the City to determine specification conformance.

An Asphalt Emulsion Tack Coat shall be included in this item. The specific pavement mixes are designated by the column headings "Asphalt Emulsion Tack Coat" of the table that constitutes Subsection M.03.01 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

A tack coat shall be required on a cold planed surface immediately prior to installation of the bituminous surface course. The tack coat shall be applied by mechanical means at a rate specified by the manufacturer and as directed by the Engineer. Tack coat shall also be applied to all vertical surfaces including but not limited to pavement limit sawed lines, curb lines, utility castings, and any other vertical surfaces where the bituminous concrete will be placed adjacent to.

### **CONSTRUCTION METHOD**

On roadways to be reclaimed or excavated, all new pavements shall consist of bituminous concrete, four (4) inches in compacted thickness unless otherwise specified within the Contract Documents or directed by the Engineer. Pavements shall be placed in two (2) courses, a two inch binder course and a two (2) inch surface course unless otherwise specified within the Contract Documents or directed by the Engineer.

On roadways to be cold planed and overlaid, all new pavements shall consist of bituminous concrete, two inches in compacted thickness, surface course unless otherwise specified within the Contract Documents or directed by the Engineer.

At all limits of work, the edges of existing bituminous concrete pavement shall be neatly saw cut for the full depth of bituminous pavement to be placed. All saw cuts shall be in straight lines. These straight lines shall be at least two feet in length before a change of direction and a minimum of six inches back from the edge of the existing pavement. Pavement breakers (jackhammers) will not be allowed for cutting the existing pavement.

Excavation Equipment Track type equipment shall be allowed on the project. Track type equipment shall not be allowed on existing pavements outside the limits of work as shown on the Plans. The Contractor shall provide all necessary planking to place under tracks of equipment to be moved across existing pavements at no expense to the City. Rubber shoes are required on the stabilizers on all excavation equipment. All damage to existing pavement or sidewalk outside the limits of excavation as defined shall be repaired or replaced by the Contractor to the satisfaction of the City, at no additional cost to the City.

Hauling Equipment Trucks or other equipment used for hauling bituminous mixtures shall have tight, clean, smooth metal beds which have been thinly coated with a minimum amount of paraffin oil, lime solution or other approved material to prevent the mixture from adhering to the beds. Each truck shall have a cover of canvas or other suitable material of such size as to protect the mixture from the weather. Truck beds shall be securely covered and, if necessary, insulated to assure delivery of the mixture at the specified temperature. No hauling trucks or other equipment shall be allowed on freshly placed bituminous pavement unless specifically permitted to do so by the City.

Spreading and Finishing all bituminous concrete pavement shall be spread by means of a mechanical paver capable of spreading the mixture true to line, grade and crown set by the Contractor and confirmed by the Engineer. The paver shall be equipped with a receiving hopper having sufficient capacity for a uniform spreading operation. The hopper shall be equipped with a distribution system to place the mixture uniformly in front of the screed. The screed and screed extenders may vibrate while placing the mixture and shall effectively produce a finished surface of the required evenness and texture without tearing, shoving or gouging the mixture. The screed and screed extenders shall be heated if necessary to maintain the bituminous mixture at the required placement temperature. Reference lines for the control of horizontal alignment shall be provided by the Contractor subject to the approval of the City.

When a reference line is used for automatic grade control, the Contractor shall furnish and install all pins, brackets, tensioning devices, wire and accessories necessary for satisfactory operation of the automatic control equipment using a taut string line set to grade for reference.

The transverse slope controller shall be capable of maintaining the screed at the desired slope within plus or minus 0.1-percent. The paver shall be equipped with automatic feeder controls, properly adjusted to maintain a uniform depth of materials ahead of the screed. Manual operation will be permitted in the construction of irregularly shaped and minor areas, on plant mixed seal courses, or where otherwise directed.

Any mixture that becomes loose and broken, mixed with dirt, or is in any way defective shall be removed and replaced with fresh hot mixture, which shall then be compacted to conform to the surrounding area. Any area showing an excess or deficiency of bituminous material shall be removed and replaced.

Rollers and Compaction Static or vibratory steel wheel rollers shall be employed. They shall be in good condition, capable of reversing without backlash, and shall be operated at speeds slow enough to avoid displacement of the bituminous mixture. However, in no case shall such rollers be operated at speeds in excess of five miles per hour.

Immediately after the bituminous mixture has been spread, struck off, and surface irregularities adjusted, it shall be thoroughly and uniformly compacted by rolling. The surface shall be rolled when the mixture is in the proper condition and when the rolling does not cause undue displacement, cracking or shoving. Unless otherwise directed, rolling shall begin at the sides and proceed longitudinally parallel to the road center line, each trip overlapping one-half the roller width, gradually progressing to the crown of the road. When paving in echelon or abutting a previously paved lane, the longitudinal joint shall be rolled first, followed by the rectangular rolling procedure.

Any displacement occurring as a result of the reversing of the direction of a roller, or from other causes, shall be corrected at once by the use of rakes and addition of fresh mixture when required. Care shall be exercised in rolling not to displace the line and grade of the edges of the bituminous mixture. To prevent adhesion of the mixture to the rollers, the wheels shall be kept properly moistened with water or water mixed with very small quantities of detergent or other approved material. Excess liquid will not be permitted.

Along forms, curbs, headers, utility boxes, walls and other places not accessible to the rollers, the mixture shall be thoroughly compacted with hot hand tampers, smoothing irons or with mechanical tampers. On depressed areas, a trench roller may be used or cleared compression strips may be used under the roller to transmit compression to the depressed area.

Unless otherwise specified, the minimum acceptable density shall be 95-percent of the density of laboratory Marshall Specimens made in the proportions of the job-mix formula; according to AASHTO T245. Density measurements may be made with a nuclear density gauge. In the event of a dispute as to the credibility of the results, the density shall be determined from cores taken from the pavement.

The rolling of the binder course shall begin when the temperature of the mat is not more than 240°F. The ideal temperature for initial compaction of all other types of hot mix is 275°F. Final compaction shall be completed before the temperature of the material drops below 175°F. The typical time that shall elapse between spreading and completion of the rolling process shall not normally exceed fifteen minutes. This time limit may be modified by the Engineer depending on temperature conditions, but under no circumstance will rolling be allowed when the temperature of the material is less than 175°F.

The speed of a static weight, steel wheel roller, pneumatic tire roller, or vibratory roller shall not exceed five miles per hour. Rollers shall not be temporarily parked on hot mix. When reversing direction, the action should be smooth, not abrupt. The drive wheel should approach the new mix, not the tiller wheel.

When any lift of bituminous concrete pavement fails to comply with the density requirements, additional compaction may be applied, when permitted and as directed, to attain the required density. If satisfactory density cannot be attained, the Contractor shall be required to remove and replace any affected area, at its own expense, which is determined by the City to be structurally inadequate and/or incapable of maintaining material integrity.

Joins Placing of the bituminous paving shall be as continuous as possible. Rollers shall not pass over the unprotected end of a freshly laid mixture unless authorized by the City.

Longitudinal and transverse joints shall be made in a careful manner. Well-bonded and sealed joints are required. In order to obtain this result, joints shall be brush-painted or pressure sprayed with a bituminous tack coat. Both longitudinal and transverse joints in successive courses shall be staggered so as not to be one above the other. Longitudinal joints shall be staggered a minimum of six (6) inches and shall be arranged so that the longitudinal joint in the top course being constructed shall be at the location of the line dividing the traffic lanes. Joints between old and new pavements, or between successive days' work, shall be carefully made in such a manner as to insure a thorough and continuous bond between the old and new surfaces. The edge of the old pavement or previously placed new pavement, shall be cut back a sufficient distance to expose a fresh, full thickness, vertical face. To obtain a well bonded joint, this face shall be brush-painted or pressure sprayed with a bituminous tack coat, after which the hot bituminous mixture shall be placed in contact with it and raked to a proper depth and grade.

Surface Tolerances The surface will be tested by the City at selected locations, using an approved 10-foot straightedge furnished by the Contractor. The variation of the surface from

the testing edge of the straightedge between any two contacts with the surface shall at no point exceed 1/4-inch. All humps or depressions exceeding the specified tolerance shall be corrected by removing defective work and replacing it with new material as directed.

Weather Limitations Bituminous concrete shall not be placed on any wet surface, or when weather conditions otherwise prevent the proper handling or finishing of the bituminous mixtures.

Restrictions Bituminous concrete paving may not be placed under any of the following conditions:

1. When the underlying layer contains frozen moisture.
2. When the temperature of this underlying layer, in the shade and away from any source of heat, is below 26°F.
3. When this temperature is below 34°F and the thickness of the lift to be placed is 1-1/2inches, or less.

b. Compaction. Rollers shall follow pavers as close as possible to provide the specified compaction. Should additional rollers be required, they will be provided in a timely manner. Specification density shall be achieved before the mix temperature drops below 175°F.

A tack coat shall be required on a cold planed surface immediately prior to installation of the bituminous surface course. The tack coat shall be applied by mechanical means at a rate specified by the manufacturer and as directed by the Engineer.

Prior to completing the surface course, all cut edges of existing pavement and vertical surfaces including but not limited to pavement limit sawed lines, curb lines, utility castings, and any other vertical surfaces where the bituminous concrete will be placed adjacent to, shall be coated with Asphalt Emulsion Tack Coat as directed by the Engineer. Asphalt Emulsion Tack Coat will be included in this item.

## **METHOD OF MEASUREMENT**

Furnish and Install Bituminous Concrete Binder Course and Bituminous Concrete Top Course Class I-1 will be measured on a "Per Ton" of asphalt basis by the amount of Bituminous Concrete material actually installed in accordance with the Plans and/or as directed by the Engineer. Any extra work associated with this item including Asphalt Emulsion Tack Coat shall be considered incidental to these items.

## **BASIS OF PAYMENT**

Furnish and Install Bituminous Concrete Binder Course and Bituminous Concrete Top Course Class I-1 shall be paid for at the respective contract unit prices "Per Ton" of asphalt as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment required to furnish and place the bituminous concrete including saw cutting, furnishing and application of the asphalt emulsion tack coat, the legal disposal of all surplus excavated and/or unsuitable material, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION C – BITUMINOUS CONCRETE PAVEMENT**

#### **C-3 FURNISH AND INSTALL BITUMINOUS CONCRETE NON-MECHANICAL**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Bituminous Concrete Non-Mechanical pavement. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

Work under this item shall include all areas where the use of mechanical spreading and finishing equipment is impractical, such as behind driveway aprons, along new or reset curb, around newly reset road castings or any other areas as directed by the Engineer. The Contractor shall confirm the extent of such areas with the Engineer prior to performing the work.

The specific pavement mixes are designated by the column headings of the table that constitutes Subsection M.03.01 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. They are: Base Course, Surface Course; Class I-1, and Asphalt Emulsion Tack Coat

Aggregates for bituminous pavements shall meet the following applicable requirements:

Coarse aggregate (retained on the No. 8 sieve) shall be crushed stone, or crushed or natural gravel, and, unless otherwise stipulated, shall conform to the respective requirements of Subsections M.01.05, M.01.10 and M.01.11 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions Section 400.

Fine aggregate shall consist of sand, stone screenings or a mixture of sand and stone screenings. Stone screenings and sands shall be free from dirt, clay, organic matter, excess fines or other deleterious materials. Fine aggregates shall conform to the quality requirements of AASHTO M29. Fine aggregate shall be of such gradation that when proportionally combined with other required aggregate fractions, the resultant mixture will meet the gradation required under the composition of mixture for the specified class.

Filler material for use in asphalt mixtures shall conform to the requirements of AASHTO M17.

Hydrated lime shall conform to the latest requirements of ASTM C207, Type N

The grade of bituminous material shall be as specified in Subsection M.03.02.1 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction,

amended December 2010 with all latest revisions Section 400. Viscosity graded AC-20 shall be used in all non-recycled paving mixtures, unless otherwise approved by the City. A certificate of analysis for asphalt cement may be required at the point of distribution. Samples may be taken at the plant and tested by the City to determine specification conformance.

An Asphalt Emulsion Tack Coat shall be included in this item. The specific pavement mixes are designated by the column headings "Asphalt Emulsion Tack Coat" of the table that constitutes Subsection M.03.01 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

A tack coat shall be required on a cold planed surface immediately prior to installation of the bituminous surface course. The tack coat shall be applied by mechanical means at a rate specified by the manufacturer and as directed by the Engineer. Tack coat shall also be applied to all vertical surfaces including but not limited to pavement limit sawed lines, curb lines, utility castings, and any other vertical surfaces where the bituminous concrete will be placed adjacent to.

### **CONSTRUCTION METHOD**

In these areas the mixture shall be spread, raked, and luted by hand tools. The mixture shall be dumped, spread, and screeded to give the required compacted thickness. Small rollers or mechanical vibrating plate compactors shall be used for compaction. All depths of material to be placed shall match adjacent.

At all limits of work, the edges of existing bituminous concrete pavement shall be neatly saw cut for the full depth of bituminous pavement to be placed. All saw cuts shall be in straight lines. These straight lines shall be at least two feet in length before a change of direction and a minimum of six inches back from the edge of the existing pavement. Pavement breakers (jackhammers) will not be allowed for cutting the existing pavement.

Any mixture that becomes loose and broken, mixed with dirt, or is in any way defective shall be removed and replaced with fresh hot mixture, which shall then be compacted to conform to the surrounding area. Any area showing an excess or deficiency of bituminous material shall be removed and replaced.

Unless otherwise specified, the minimum acceptable density shall be 95-percent of the density of laboratory Marshall Specimens made in the proportions of the job-mix formula; according to AASHTO T245. Density measurements may be made with a nuclear density gauge. In the event of a dispute as to the credibility of the results, the density shall be determined from cores taken from the pavement.

When any lift of bituminous concrete pavement fails to comply with the density requirements, additional compaction may be applied, when permitted and as directed, to attain the required density. If satisfactory density cannot be attained, the Contractor shall be required to remove and replace any affected area, at its own expense, which is determined by the City to be structurally inadequate and/or incapable of maintaining material integrity.

Joints Placing of the bituminous paving shall be as continuous as possible.

Surface Tolerances the surface will be tested by the City at selected locations, using an approved 10-foot straightedge furnished by the Contractor. The variation of the surface from the testing edge of the straightedge between any two contacts with the surface shall at no point exceed 1/4-inch. All humps or depressions exceeding the specified tolerance shall be corrected by removing defective work and replacing it with new material as directed.

Weather Limitations Bituminous concrete shall not be placed on any wet surface, or when weather conditions otherwise prevent the proper handling or finishing of the bituminous mixtures.

Restrictions Bituminous concrete paving may not be placed under any of the following conditions:

1. When the underlying layer contains frozen moisture.
2. When the temperature of this underlying layer, in the shade and away from any source of heat, is below 26°F.
3. When this temperature is below 34°F and the thickness of the lift to be placed is 1-1/2inches, or less.

A tack coat shall be required on a cold planed surface immediately prior to installation of the bituminous surface course. The tack coat shall be applied by mechanical means at a rate specified by the manufacturer and as directed by the Engineer.

Prior to completing the surface course, all cut edges of existing pavement and vertical surfaces including but not limited to pavement limit sawed lines, curb lines, utility castings, and any other vertical surfaces where the bituminous concrete will be placed adjacent to, shall be coated with Asphalt Emulsion Tack Coat as directed by the Engineer. Asphalt Emulsion Tack Coat will be included in this item.

## **METHOD OF MEASUREMENT**

Furnish and Install Bituminous Concrete Non-Mechanical will be measured on a "Per Ton" of asphalt basis by the amount of Bituminous Concrete material actually installed in accordance with the Plans and/or as directed by the Engineer. Any extra work associated with this item including Asphalt Emulsion Tack Coat shall be considered incidental to these items.

## **BASIS OF PAYMENT**

Furnish and Install Bituminous Concrete Non-Mechanical shall be paid for at the respective contract unit prices "Per Ton" of asphalt as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment required to furnish and place the bituminous concrete including saw cutting, furnishing and application of the asphalt emulsion tack coat, the legal disposal of all surplus excavated and/or unsuitable material, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION C – BITUMINOUS CONCRETE PAVEMENT**

#### **C-4 FURNISH AND INSTALL BITUMINOUS CONCRETE BERM**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Bituminous Concrete Berm Type I-1. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

Work under this item shall include furnishing and installing bituminous concrete berm, Type I-1 done by mechanical and non-mechanical means as directed by the Engineer. The Contractor shall confirm the extent of such areas with the Engineer prior to performing the work.

The specific pavement mixes are designated by the column headings of the table that constitutes Subsection M.03.01 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. They are: Base Course, Surface Course; Class I-1, and Asphalt Emulsion Tack Coat

Aggregates for bituminous pavements shall meet the following applicable requirements:

Coarse aggregate (retained on the No. 8 sieve) shall be crushed stone, or crushed or natural gravel, and, unless otherwise stipulated, shall conform to the respective requirements of Subsections M.01.05, M.01.10 and M.01.11 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions Section 400.

Fine aggregate shall consist of sand, stone screenings or a mixture of sand and stone screenings. Stone screenings and sands shall be free from dirt, clay, organic matter, excess fines or other deleterious materials. Fine aggregates shall conform to the quality requirements of AASHTO M29. Fine aggregate shall be of such gradation that when proportionally combined with other required aggregate fractions, the resultant mixture will meet the gradation required under the composition of mixture for the specified class.

Filler material for use in asphalt mixtures shall conform to the requirements of AASHTO M17.

Hydrated lime shall conform to the latest requirements of ASTM C207, Type N

The grade of bituminous material shall be as specified in Subsection M.03.02.1 of the Rhode Island Department of Transportation Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions Section 400. Viscosity graded AC-20 shall be used in all non-recycled paving mixtures, unless otherwise approved by the City. A certificate of

analysis for asphalt cement may be required at the point of distribution. Samples may be taken at the plant and tested by the City to determine specification conformance.

An Asphalt Emulsion Tack Coat shall be included in this item. The specific pavement mixes are designated by the column headings "Asphalt Emulsion Tack Coat" of the table that constitutes Subsection M.03.01 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

### **CONSTRUCTION METHOD**

Bituminous Concrete Berm shall be placed by mechanical means at the same time as the Bituminous Concrete Top Coarse wherever possible so that the Berm is monolithic to the road surface.

### **METHOD OF MEASUREMENT**

Furnish and Install Bituminous Concrete Berm will be measured on a "Per Linear Foot" of Berm basis by the amount of Bituminous Concrete Berm material actually installed in accordance with the Plans and/or as directed by the Engineer. Any extra work associated with this item including Asphalt Emulsion Tack Coat shall be considered incidental to these items.

### **BASIS OF PAYMENT**

Furnish and Install Bituminous Concrete Berm shall be paid for at the respective contract unit prices "Per Linear Foot" of Berm as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment required to furnish and place the bituminous concrete berm including furnishing and application of the berm, the legal disposal of all surplus excavated and/or unsuitable material, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION D – CURB WORK**

#### **D-1 REMOVE AND RESET EXISTING CURB**

#### **D-2 REMOVE AND STOCKPILE EXISTING CURB**

#### **D-3 FURNISH AND INSTALL NEW GRANITE CURB**

#### **D-4 FURNISH AND INSTALL NEW GRANITE INLET STONE**

### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Remove and Reset, Remove and Stockpile Existing Curb, and Furnish and Install New Granite Curbs and Inlet Stones to the new roadway elevation. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Stockpiled curbing shall be used by the Contractor when necessary. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

The Contractor shall protect removed curbing from damage and store them in a safe manner. Any curb damaged due to carelessness shall be replaced at the Contractors expense.

### **MATERIALS**

New granite curb and inlet stones shall be hard and durable, predominately gray in color, free from seams that impair its structural integrity, and of smooth-splitting character. Natural color variations characteristic of the deposit will be permitted. New bluestone curb shall be blue colored curbing from one source, approved by the City. The exposed faces of all curb shall be free from drill holes. Half drill holes no larger than  $\frac{3}{4}$ " in diameter will be permitted in the arris line in the plane of the curb backside. All curb shall have a top surface sawed or dressed to an approximate true plane, with no depressions or projections over  $\frac{1}{8}$ ". The top front arris line shall be straight and true, with no variations from a straight line greater than  $\frac{1}{8}$ ". The top back arris line shall meet the same requirement except  $\frac{3}{8}$ " variation shall be allowed. The front face shall be at right angles to the top and shall be smooth split. It shall have no projections greater than 1" or depressions greater than  $\frac{1}{2}$ " for a distance of eight inches (8") from the top. The ends of the curb shall be square with the tops, back and face. Nominal dimensions for all curb shall be as follows:

Length:	3 feet to 8 feet
Height:	18 inches $\pm$ 1 inch
Thickness:	6 inches $\pm$ $\frac{1}{8}$ inch

Portland Cement Concrete used for curb lock shall be Class B (conforming to Section 601 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions) or better and used in all locations where curbing has been reset or furnished and installed.

## **CONSTRUCTION METHOD**

Stone curbing to be Removed and Reset or Removed and Stockpiled shall be designated as such in the field by the Engineer. All concrete curbing shall be removed and disposed unless otherwise directed by the Engineer. Bituminous Concrete shall be saw cut no less than 18 inches from the face of curb in all areas where curb is to be Removed and Reset, Removed and Stockpiled, or Furnished and Installed New. Old curbing shall be excavated, reset or replaced new on a compacted surface, locked in place with Portland Cement Concrete and back filled to bottom of sidewalk grade. In the event that the curb to be reset or installed new is in a newly paved area under moratorium, the Bituminous Concrete saw cut may be closer to the face of curb as approved or directed by the Engineer.

At this point the asphalt shall be removed and disposed of. The sidewalk behind the curb shall then be removed carefully such that no damage is caused to the curb stone or any surrounding structures and disposed of. The earth on either side of the stone curb shall be removed and placed elsewhere in order to expel the stone from its current position. The curb shall then be reset over a minimum of twelve inches of mechanically compacted crushed processed gravel. The base for the set stone shall be graded and mechanically compacted to allow for a six (6) inch curb reveal where possible or as otherwise directed by the Engineer. Upon this foundation, the curbing shall be laid with adjacent sections against each other, leaving closely fitted joints, with no gaps greater than ¼". Curbs being reset shall be saw cut or trimmed as necessary. All spaces under the curbing shall be filled with gravel and tamped so that the curb will bear thoroughly its entire length and be at the required line and grade.

After the curbing has been set to line and grade and the underlying base material thoroughly compacted, the remaining trench shall be backfilled, and thoroughly compacted on the back side of the curb to the bottom of sidewalk grade. Portland Cement Concrete curb lock shall be used for backfill on the front face of the curb. The curb lock shall be at least six inches thick and shall not extend above the grade of the existing gravel road base. The trench shall then be filled and properly compacted with Bituminous Concrete Binder Coarse and Type I-1 Pavement.

## **METHOD OF MEASUREMENT**

Remove and Reset or Remove and Stockpile Existing Curb, and Furnish and Install New Granite Curbs will be measured on a "Per Linear Foot" basis by the length of such stones actually removed and reset, removed and stockpiled, or furnished and installed new in accordance with the Plans and/or as directed by the Engineer. Furnish and Install New Granite inlet Stones will be measured on a "Per Each" basis by the number of stones actually removed and installed new in accordance with the Plans and/or as directed by the Engineer.

## **BASIS OF PAYMENT**

Remove and Reset or Remove and Stockpile Existing Curb, and Furnish and Install New Granite Curbs shall be paid for at the respective contract unit prices "Per Linear Foot" as listed in the Proposal. Furnish and Install New Granite Inlet Stones shall be paid for at the respective contract unit price "Per Each" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) saw cutting, excavation, loading, hauling, stockpiling, placement and compaction of backfill,

resetting, furnish of granite curbing and inlet stones, trimming, Portland cement concrete, placement of Portland cement concrete, the legal disposal of all surplus excavated and/or unsuitable material and unusable curbing, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

The disposal of sidewalk panels shall be included in the Portland Cement Concrete Sidewalk item. Furnish and Install Crushed Processed Gravel shall be paid for under its respective item.

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-1 FURNISH AND INSTALL 5" PCC CLASS A SIDEWALK E-2 FURNISH AND INSTALL 6" PCC CLASS A DRIVEWAY / WCR**

#### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install 5" or 6" Portland Cement Concrete Class A Sidewalk. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

#### **MATERIALS**

Portland Cement Concrete shall be Class A as specified within Section 601 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, and either five (5) or six (6) inches in thickness depending on location and use.

All sidewalks shall be five (5) inches in thickness. All driveways and wheelchair ramps shall be six (6) inches in thickness.

Portland Cement Concrete used for other items such as curb lock, utility castings, or at locations directed by the Engineer shall be included as incidentals to the respective item.

#### **CONSTRUCTION METHOD**

It shall be the responsibility of the Contractor to carefully remove the designated concrete so as not to damage any adjacent concrete not intended for removal. If any damage occurs to such slabs, it shall be the responsibility of the Contractor to replace those slabs with new concrete at his expense. The sidewalk slabs that are to be replaced will be marked by the Engineer and all joints between new work and existing slabs shall be saw cut straight and true.

The Contractor shall also exercise due care not to injure trees during excavation. The Contractor shall protect trees with boards, burlap, padding or other protective material as may be required to avoid injury. After the existing concrete has been removed, roots within the construction area shall remain undisturbed unless otherwise directed by the City Tree Warden. All work shall be done as directed by the City Tree Warden or his designee.

Where the areas to be replaced contain manhole covers, curb boxes, or other utility structures, it shall be the responsibility of the Contractor to properly reset those utilities to grade, or to contact the respective utility company for them to do the same. Payment for this procedure is to be included under their respective items.

It shall be the responsibility of the Contractor to immediately remove from the site all excavated concrete and to dispose of it in the proper and legal manner.

After the approved gravel base has been thoroughly compacted and well graded, forms shall be placed such that wet concrete shall not be placed directly against loam, fencing, plants, or stones. Forms shall be of sufficient strength to hold their shape and to assure true alignment of the finished concrete. They shall extend to the full depth of the concrete. Forms shall be placed such that a pitch of 1.5% to 2% from the curb to the back of sidewalk is attained. For wheelchair ramps, forms shall be placed such that the ramp meets all Federal, State, and local ADA requirements.

Cement shall conform to Standard Specification of ASTM Designation C-150, latest revision, for Type 1 Portland Cement. Fine aggregate for concrete shall be well-graded natural sand, and coarse aggregate shall be crushed stone or gravel. They shall conform to Standard Specifications of ASTM Designation C33-44, for concrete aggregates. Coarse aggregate shall be of designated size "1-inch to No. 4" in accordance with the gradation for that range of sizes in ASTM Specifications referred to above.

Fine aggregate for concrete shall conform to the requirements of AASHTO M6 and shall consist of natural sand, manufactured sand produced from larger aggregate, or a combination thereof. Manufactured sand shall be graded with a minimum percentage of flat elongated particles. All fine sand shall consist of hard, strong, durable particles, which are free from coatings or any injurious materials and injurious amount of clay, loam, or other deleterious substances. In addition the fine aggregate shall not contain substances which, when mixed in Portland cement concrete, produce an unacceptable level of chloride ions in the final product. Substances that produce chloride ions shall be considered deleterious material. Any fine aggregate may be rejected if it is determined by the Engineer to contain sufficient amounts of unsound or deleterious material to be harmful. Coarse aggregate shall consist of screened gravel, crushed gravel, or crushed quarry rock. Coarse aggregate for concrete shall conform to the requirements of AASHTO M80.

Calcium Chloride in any form shall not be used in any Portland cement concrete.

Water used in mixing and curing of concrete shall be subject to approval and shall be reasonably clean and free of oil, salt, acid, alkali, sugar, vegetable, or other substance injurious to the finished project. The amount of water used shall be not more than 6 gallons per bag of cement, and less shall be used if required, depending upon the character of the aggregates, the proportion of coarse to fine materials in the aggregates and the consistency desired for various parts of the work. Proper allowance shall be made for the moisture content in the aggregates. Slump, at the time of placing, shall not exceed four inches. The exact proportions of water, cement, sand and coarse aggregate shall be varied as ordered to give the best results for the aggregates used. No concrete shall be deposited in or under water and care shall be taken that no water flows over concrete until it has set. The foundation material upon which concrete is to be placed shall be approved by the Engineer before pouring commences. Pipes to be encased in concrete shall be clean and adequately restrained to prevent movement during the pouring operation.

Forms shall be clean and thoroughly wet before concrete is placed. Whenever fresh and old concrete masonry are jointed, immediately before placing fresh concrete the contact surface of the old concrete shall be thoroughly cleaned, using a stiff brush or other tools and a stream of water under pressure, and the surface shall be clean and wet but free from pools of water at

the moment the fresh concrete is placed. Expansion joints shall be placed adjacent to previously existing sidewalk to be pour up against. Special care shall be taken to keep pipes, steps and other inserts placed in the concrete at the proper lines and grades. Joints in the concrete shall be made only at such points as are shown, specified, directed or as permitted by the Engineer.

Tests for strength and consistency of the concrete will be made by the Engineer at no expense to the Contractor. However, any portion of the work found not meeting requirements for strength and/or consistency shall be removed and replaced by the Contractor at no expense to the Owner.

Expansion joints are required at regular intervals, every 20 feet, and whenever the sidewalk meets another walk, driveway, lighting standard, or other rigid object. Expansion joints shall be 1/2-inch thick and of a pre-molded, bituminous-coated type, placed parallel to the contraction joints. They shall extend to the full depth of the concrete. The concrete shall be finished with a float and lightly broomed; all sides shall be rounded with an edger.

Contraction joints shall be formed by cutting a slot in the slab about one (1) inch deep and generally spaced at about six (6) foot intervals. After the concrete has partly hardened, the joint shall be edged with a double edger held against a straight edge to make a clean, straight joint. Concrete finishing tools shall meet the following specifications:

Groovers shall be made of bronze, 4-1/2" wide with a bit size of 1/2" wide at the top and 1" deep as manufactured by Goldblatt Tool Co., Model No. 06 314 M7 or an approved equal.

Edgers shall be made of bronze, 2-3/4" wide with a 5/8" deep lip on a 1/4" radius as manufactured by Goldblatt Tool Co., Model No. 06 311 M7 or an approved equal.

Concrete shall be edged or "shined" along all expansion joints and control joints. The sidewalk shall also be edged along curb lines and forms.

Concrete shall be protected so that moisture is not lost during the early stages of hardening. The Contractor shall protect the concrete from the sun or drying winds by placing and thoroughly securing 5 mil polyethylene sheeting over the finished concrete. Protective covering shall be left in place for a minimum of three days. The Contractor may also use approved membrane curing compounds sprayed on the surface of the concrete. These compounds shall be applied immediately after the concrete has been finished.

Concrete shall not be placed when the temperature is below 40 degrees Fahrenheit, without prior approval of the Engineer. In the case of an anticipated drop in temperature, all recommended cold weather curing methods shall be instituted by the Contractor at his own expense before leaving the site to insure continued curing of the concrete at normal temperatures.

The Contractor shall be responsible for maintaining new concrete work and shall insure that no defects, markings, or damage by vandals or animals occurs. It shall be the responsibility of the Contractor to replace any damaged portions of the work at his own expense. The Contractor shall provide all necessary temporary structures to insure easy accessibility to residences and

businesses in all areas of his work. He shall provide lighted barricades at all hazardous locations and as directed by the Engineer.

Forms shall be removed in such a manner as to insure the new concrete against damage or injury. At no time will the forms be removed within 24 hours after placing of concrete, or not until the concrete has sufficiently hardened to prevent injury, whichever is greater. The Contractor shall fill voids left by the removal of the forms that were required to construct the new concrete sidewalks and wheelchair ramps with loam and seed.

For concrete constructed within the vehicular travel way or driveway, a minimum of 24 hours curing time shall be required before vehicular use. The Contractor shall provide all signs, cones, and barricades necessary to protect the concrete. **The Contractor shall notify Property owners or residents at least 24 hours prior to disturbing driveways.**

Any damage caused by excavation of a sidewalk shall be the sole responsibility of the Contractor. Care shall be taken when excavating any sidewalk or objects as to no disturb existing buildings, foundations, utilities, or any other existing structure etc. The Contractor shall be responsible for contact and communication with City Yard Employees when using stockpiled material.

#### **METHOD OF MEASUREMENT**

Furnish and Install 5" or 6" Portland Cement Concrete Class A Sidewalk will be measured on a "Per Square Yard" basis by the area of sidewalk actually removed and installed in accordance with the Plans and/or as directed by the Engineer. Only the square yardage of the newly constructed sidewalk shall count towards the measurement of this item. All areas that require concrete thicknesses larger than six (6) inches will be measured as a ratio as it relates to the theoretical square yardage of six (6) inch concrete and shall be paid for at the Contract unit price for Furnish And Install 6" PCC Class A Driveway / WCR, as approved and directed by the Engineer only.

#### **BASIS OF PAYMENT**

Furnish and Install 5" or 6" Portland Cement Concrete Class A Sidewalk shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) saw cutting, excavation, placing and compacting Crushed Processed Gravel or Excess Reclaimed Material as directed by the Engineer, hauling, loading/unloading, trimming and fine grading, mechanical compaction, setting forms, and furnishing, placing and finishing Portland Cement Concrete to the required thickness, then removing forms, backfilling, clean-up, the legal disposal of all surplus excavated and/or unsuitable material and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

The excavation and disposal of sidewalk panels shall be included in the Portland Concrete Sidewalk item. Furnish and Install Crushed Processed Gravel, Loam and Seed, and Bituminous Concrete Pavement Non-Mechanical shall be paid for under their respective items.

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-3 FURNISH AND INSTALL DETECTABLE WARNING SYSTEM**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Detectable Warning Systems. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

Detectable warning systems shall be ADA solutions, Inc. Cast in Place Embedment Panel Detectable Warning Surface System 24" x 36" sound attenuating curb ramp tile (inune dome) or approved equal. All detectable warning systems shall have a dome spacing of 1.67" and be "Brick Red" color.

##### **CONSTRUCTION METHOD**

All concrete poured wheelchair access ramps shall have a detectable warning system installed. The Contractor shall install the cast in place detectable warning systems while pouring the wheelchair access ramp.

Detectable warning systems shall be clean upon installation and protected by plastic sheeting while pouring concrete. All detectable warning systems shall be edged ("shined") around the complete perimeter with the same concrete finishing tools listed in the Portland Cement Concrete specification. When the concrete has cured, it will be the responsibility of the Contractor to remove the protective plastic from the delectable warning system.

##### **METHOD OF MEASUREMENT**

Furnish and Install Detectable Warning Systems will be measured on a "Per Square foot" basis by the area of detectable warning system actually installed in accordance with the Plans and/or as directed by the Engineer.

##### **BASIS OF PAYMENT**

Furnish and Install Detectable Warning Systems shall be paid for at the respective contract unit prices "Per Square Foot" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) furnishing and installation of plastic detectable warning systems in all wheelchair access ramps constructed of concrete and any other incidentals associated with the work complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-4 REMOVE AND RESET BRICK SIDEWALK**

#### **E-5 FURNISH AND INSTALL BRICK SIDEWALK**

#### **E-6 REMOVE AND RESET BELGIAN BLOCK**

### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Brick Sidewalk, and Remove and Reset Brick Sidewalk or Belgian Blocks. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

### **MATERIALS**

Portland Cement Concrete shall be Class A as specified within Section 601 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, and either four (4) or six (6) inches in thickness depending on location and use.

Mortar used shall be in accordance with all RIDOT specifications including The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

New bricks shall be Boston City Hall pavers as manufactured by Stiles & Hart Brick Company.

All sidewalks shall be four (4) inches in thickness. All driveways and wheelchair ramps shall be six (6) inches in thickness. All Bricks shall be set on one (1) inch of stone dust.

All Belgian block to be set within the roadway shall be over six (6) inches of concrete and one (1) inch of mortar.

Portland Cement Concrete used for other items such as curb lock, utility castings, or at locations directed by the Engineer shall be included as incidentals to the respective item.

### **CONSTRUCTION METHOD**

It shall be the responsibility of the Contractor to carefully remove the designated concrete so as not to damage any adjacent concrete not intended for removal. If any damage occurs to such slabs, it shall be the responsibility of the Contractor to replace those slabs with new concrete at his expense. The sidewalk slabs that are to be replaced will be marked by the Engineer and all joints between new work and existing slabs shall be cut straight with the use of a saw.

The Contractor shall also exercise due care not to injure trees during excavation. The Contractor shall protect trees with boards, burlap, padding or other protective material as may

be required to avoid injury. After the existing concrete has been removed, roots within the construction area shall remain undisturbed unless otherwise directed by the City Tree Warden. All work shall be done as directed by the City Tree Warden or his designee.

Where the areas to be replaced contain manhole covers, curb boxes, or other utility structures, it shall be the responsibility of the Contractor to properly reset those utilities to grade, or to contact the respective utility company for them to do the same. Payment for this procedure is to be included under their respective items.

It shall be the responsibility of the Contractor to immediately remove from the site all excavated concrete and to dispose of it in the proper and legal manner.

Any damage caused by careless excavation deemed so by the Engineer shall be replaced by the Contractor at his own expense.

Any sidewalks that consist of brick or Belgian blocks shall be excavated with care so that the materials are not damaged and may be reset. Care must be taken while removing and storing the existing bricks or Belgian blocks. Any pavers damaged or lost due to carelessness by the Contractor shall be replaced in kind and at the Contractor's expense. The Contractor shall dispose of any broken or damaged bricks rejected by the Engineer. It shall be the responsibility of the Contractor to purchase new brick or Belgian block to maintain existing limits (which shall be included under this item). New pallets of pavers shall be mixed with salvaged pavers to disperse color deviation. Bricks and Belgian blocks shall then be reset under this item.

The Contractor shall protect removed pavers from damage and store them in a safe manner.

After the approved gravel base has been thoroughly compacted and well graded, forms shall be placed such that wet concrete shall not be placed directly against loam, fencing, plants, or stones. Forms shall be of sufficient strength to hold their shape and to assure true alignment of the finished concrete. They shall extend to the full depth of the concrete. Forms shall be placed such that a pitch of 1.5% to 2% from the curb to the back of sidewalk is attained. For wheelchair ramps, forms shall be placed such that the ramp meets all Federal, State, and local ADA requirements.

Cement shall conform to Standard Specification of ASTM Designation C-150, latest revision, for Type 1 Portland Cement. Fine aggregate for concrete shall be well-graded natural sand, and coarse aggregate shall be crushed stone or gravel. They shall conform to Standard Specifications of ASTM Designation C33-44, for concrete aggregates. Coarse aggregate shall be of designated size "1-inch to No. 4" in accordance with the gradation for that range of sizes in ASTM Specifications referred to above.

Fine aggregate for concrete shall conform to the requirements of AASHTO M6 and shall consist of natural sand, manufactured sand produced from larger aggregate, or a combination thereof. Manufactured sand shall be graded with a minimum percentage of flat elongated particles. All fine sand shall consist of hard, strong, durable particles, which are free from coatings or any injurious materials and injurious amount of clay, loam, or other deleterious substances. In addition the fine aggregate shall not contain substances which, when mixed in Portland cement concrete, produce an unacceptable level of chloride ions in the final product. Substances that

produce chloride ions shall be considered deleterious material. Any fine aggregate may be rejected if it is determined by the Engineer to contain sufficient amounts of unsound or deleterious material to be harmful. Coarse aggregate shall consist of screened gravel, crushed gravel, or crushed quarry rock. Coarse aggregate for concrete shall conform to the requirements of AASHTO M80.

Calcium Chloride in any form shall not be used in any Portland cement concrete.

Water used in mixing and curing of concrete shall be subject to approval and shall be reasonably clean and free of oil, salt, acid, alkali, sugar, vegetable, or other substance injurious to the finished project. The amount of water used shall be not more than 6 gallons per bag of cement, and less shall be used if required, depending upon the character of the aggregates, the proportion of coarse to fine materials in the aggregates and the consistency desired for various parts of the work. Proper allowance shall be made for the moisture content in the aggregates. Slump, at the time of placing, shall not exceed four inches. The exact proportions of water, cement, sand and coarse aggregate shall be varied as ordered to give the best results for the aggregates used. No concrete shall be deposited in or under water and care shall be taken that no water flows over concrete until it has set. The foundation material upon which concrete is to be placed shall be approved by the Engineer before pouring commences. Pipes to be encased in concrete shall be clean and adequately restrained to prevent movement during the pouring operation.

Forms shall be clean and thoroughly wet before concrete is placed. Whenever fresh and old concrete masonry are jointed, immediately before placing fresh concrete the contact surface of the old concrete shall be thoroughly cleaned, using a stiff brush or other tools and a stream of water under pressure, and the surface shall be clean and wet but free from pools of water at the moment the fresh concrete is placed. Expansion joints shall be placed adjacent to previously existing sidewalk to be pour up against. Special care shall be taken to keep pipes, steps and other inserts placed in the concrete at the proper lines and grades. Joints in the concrete shall be made only at such points as are shown, specified, directed or as permitted by the Engineer.

Tests for strength and consistency of the concrete will be made by the Engineer at no expense to the Contractor. However, any portion of the work found not meeting requirements for strength and/or consistency shall be removed and replaced by the Contractor at no expense to the Owner.

Expansion joints are required at regular intervals, every 20 feet, and whenever the sidewalk meets another walk, driveway, lighting standard, or other rigid object. Expansion joints shall be 1/2-inch thick and of a pre-molded, bituminous-coated type, placed parallel to the contraction joints. They shall extend to the full depth of the concrete.

Concrete shall be protected so that moisture is not lost during the early stages of hardening. The Contractor shall protect the concrete from the sun or drying winds by placing and thoroughly securing 5 mil polyethylene sheeting over the finished concrete. Protective covering shall be left in place for a minimum of three days. The Contractor may also use approved membrane curing compounds sprayed on the surface of the concrete. These compounds shall be applied immediately after the concrete has been finished.

Concrete shall not be placed when the temperature is below 40 degrees Fahrenheit, without prior approval of the Engineer. In the case of an anticipated drop in temperature, all recommended cold weather curing methods shall be instituted by the Contractor at his own expense before leaving the site to insure continued curing of the concrete at normal temperatures.

The Contractor shall be responsible for maintaining new concrete work and shall insure that no defects, markings, or damage by vandals or animals occurs. It shall be the responsibility of the Contractor to replace any damaged portions of the work at his own expense. The Contractor shall provide all necessary temporary structures to insure easy accessibility to residences and businesses in all areas of his work. He shall provide lighted barricades at all hazardous locations and as directed by the Engineer.

Forms shall be removed in such a manner as to insure the new concrete against damage or injury. At no time will the forms be removed within 24 hours after placing of concrete, or not until the concrete has sufficiently hardened to prevent injury, whichever is greater. The Contractor shall fill voids left by the removal of the forms that were required to construct the new concrete sidewalks and wheelchair ramps with loam and seed.

For concrete and/or brick/Belgian block constructed within the vehicular travel way or driveway, a minimum of 24 hours curing time (from the last constructed) shall be required before vehicular use. The Contractor shall provide all signs, cones, and barricades necessary to protect the concrete and/or brick/Belgian block. **The Contractor shall notify Property owners or residents at least 24 hours prior to disturbing driveways.**

Any damage caused by excavation of a sidewalk shall be the sole responsibility of the Contractor. Care shall be taken when excavating any sidewalk or objects as to no disturb existing buildings, foundations, utilities, or any other existing structure etc.

After the concrete base has been poured and cured properly, the paver shall then be reset upon the concrete base. All bricks are to be set on a one (1) inch bed of stone dust in a tight fitting, running bond pattern, and any segments of brick shall be cut in an approved manner. No gaps wider than ¼" shall be permitted between bricks, or where they meet curb, foundations, walls, other sidewalks, or utility structures. Where there is no such hard surface to contain the brickwork, install 1" x 4" pressure treated timber as backing. Stone dust shall be swept into all brick joints to completely fill all voids. All brickwork shall be compacted with vibratory equipment on top of a stone dust protective layer that shall be removed after completion of compaction.

All Belgian Blocks are to be set on a one (1) inch bed of mortar in a tight fitting, running bond pattern, and any segments of blocks shall be cut in an approved manner. No gaps wider than ¾" shall be permitted between blocks, or where they meet curb, foundations, walls, other sidewalks, or utility structures.

The Belgian Blocks shall be tamped in place such that the pavement surface is level. Any variations exceeding ½ inch shall be reset to proper grade. The Belgian Block paving joints shall be filled with mortar. The process shall be repeated until all joints are full.

## **METHOD OF MEASUREMENT**

Furnish and Install Brick Sidewalk, and Remove and Reset Brick Sidewalk or Belgian Blocks will be measured on a "Per Square Yard" basis by the area of sidewalk/roadway actually removed and installed in accordance with the Plans and/or as directed by the Engineer. Only the square yardage of the newly constructed sidewalk/roadway shall count towards the measurement of this item.

## **BASIS OF PAYMENT**

Furnish and Install Brick Sidewalk, and Remove and Reset Brick Sidewalk or Belgian Blocks shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) saw cutting, excavation and legal disposal, placing and compacting Crushed Processed Gravel or Excess Reclaimed Material as directed by the Engineer, hauling, loading/unloading, trimming and fine grading, mechanical compaction, setting forms, and furnishing, placing Portland Cement Concrete to the required thickness, then removing forms, backfilling, furnish and installation of stone dust or mortar, furnish of bricks as directed by the Engineer, resetting of bricks or Belgian blocks, clean-up, the legal disposal of all surplus excavated and/or unsuitable material and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

The excavation and disposal of sidewalk panels or concrete base material shall be included in this item. Furnish and Install Crushed Processed Gravel, Loam and Seed, and Bituminous Concrete Pavement Non-Mechanical shall be paid for under their respective items.

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-7 REMOVE AND RESET BLUESTONE SIDEWALK E-8 REMOVE AND RESET BLUESTONE CROSSWALK**

#### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Remove and Reset Bluestone Sidewalks and Crosswalks. All work shall be in accordance with the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

#### **MATERIALS**

Mortar for setting bed and joints shall conform to Section M.09.05.7, Mortar, of the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Only fresh mortar is to be used for this work. Mortar in which initial set has begun or is more than 30 minutes old, whichever comes first, shall be discarded and replaced with fresh mortar. No retempering of mortar will be permitted.

Bluestone pavers shall be clean, dense, uniformly colored, durable, even-grained stone, free from stains, cracks, chips, irregularities, weak fracture planes and any other defect that, in the opinion of the Engineer, will make the material unsuitable for the intended use. Bluestone pavers shall be sized in rectangular shapes:

- (a) 36 inches by 42 inches for sidewalks, wheelchair ramps, and driveways; and shall have a thickness of one half inches (1 ½") with a tolerance of +/-1/8" within Washington Square, and
- (b) 24 inches by 36 inches for sidewalks, wheelchair ramps, and driveways; and shall have a thickness of one half inches (1 ½") with a tolerance of +/-1/8" elsewhere.
- (c) 24 inches by 48 inches for crosswalks and have a thickness of two inches (2") with a tolerance of +/-1/8" within Washington Square.
- (d) Other sizes or thicknesses may be substituted as described in the Contract Documents, shown in the drawing/plans, and/or as directed by the Engineer. This item title may be changed for a specific Contract

The pavers are to be thermal finished to create a non-slip surface, blue-grey in color, and shall be from one supply source to ensure the color consistency of the pavers. The bluestone shall be diamond sawed with a smooth surface. All edges shall be cut perfectly square, except where miter cuts are necessary to form the wheelchair ramp pavers, matching existing buildings, foundations, utilities, or any other existing structure etc. All cuts shall be straight and true. The thermal "light flame" finish must be performed during the fabrication of the pavers and must not adversely affect the performance, durability or color of the stones. The Contractor shall provide a sample to be approved by the Engineer before ordering any bluestone for the project.

## **CONSTRUCTION METHOD**

It shall be the responsibility of the Contractor to carefully remove the designated bluestone that is cracked, chipped, stained, broken, and/or damaged in any other way so as not to damage any adjacent bluestone or concrete not intended for removal. If any damage occurs to such stone or slabs, it shall be the responsibility of the Contractor to replace them with new bluestone or concrete at his expense. The stones that are to be replaced will be marked by the Engineer and all joints between new work and existing slabs shall be cut straight with the use of a saw.

Any damage caused by excavation of a sidewalk or the carelessness deemed so by the Engineer shall be the sole responsibility of the Contractor. Care shall be taken when excavating any sidewalk or objects as to no disturb existing buildings, foundations, utilities, or any other existing structure etc.

The Contractor shall also exercise due care not to injure trees during excavation. The Contractor shall protect trees with boards, burlap, padding or other protective material as may be required to avoid injury. After the existing concrete has been removed, roots within the construction area shall remain undisturbed unless otherwise directed by the City Tree Warden. The Contractor shall not begin constructing the sidewalk in the areas within the drip line of a tree until the City of Newport Tree Warden has inspected the tree roots and determines whether the roots need to be pruned. If pruning is deemed necessary by the Tree Warden, all pruning will be completed by the Contractor at the direction of the Tree Warden before construction of the sidewalk begins. All work shall be done as directed by the City Tree Warden or his designee.

Where the areas to be replaced contain manhole covers, curb boxes, or other utility structures, it shall be the responsibility of the Contractor to properly reset those utilities to grade, or to contact the respective utility company for them to do the same. Payment for this procedure is to be included under their respective items.

The work of these items must be performed in a careful, professional manner suitable for the historic character of the area. The subject work is to be accomplished by skilled craftsmen with demonstrated experience in the installation of comparable historic and/or specialty pavements in accordance with the details shown on the plans, these contract specifications and as directed by the Engineer. Bluestone sidewalk shall be installed such that only one block is under construction and is being impacted at any one given time. Removal of existing sidewalk in front of business/commercial establishments shall not be permitted until the required amount of bluestone for a given block or repair has been delivered to the project site and is available for installation by the Contractor.

It shall be the responsibility of the Contractor to immediately remove from the site all excavated material and to dispose of it in the proper and legal manner.

Installation sequence for the furnish and installation of the bluestone sidewalks and crosswalks shall be as follows: Excavate and remove existing bluestone slabs designated to be removed by saw cutting or hand chiseling adjacent joints. The Contractor shall use a hand chisel or a chipping gun to remove damaged bluestone panels and the mortar setting bed.

New pavers shall be furnished and installed by the Contractor to match existing surrounding stones. Pavers shall be placed in a running bond pattern such that the joints are either perpendicular or parallel to the curb line and off set one half stone. A preformed expansion joint filler conforming to AASHTO-M153 shall be placed between the bluestone pavers/concrete slab and any existing structures at the back of the sidewalk.

Place the 1" mortar bedding over concrete slab immediately before setting the pavers such that the entire paver is sitting in the mortar with no voids. The concrete slab and pavers are to be in "saturated-surface dry condition" when the mortar and pavers are placed. Pavers shall be properly seated on the mortar bed using suitable mallets or other tools. Joints shall be pointed flush with the tops of the pavers. Care shall be taken to avoid mortar stains on the tops of the pavers such as tape masking and sponge cleaning. Mortar dropped on the bluestone surface must be immediately and completely removed. The Contractor must protect the work from pedestrian, vehicular or any other form of damage until the work is accepted. Mortared joints shall not be filled by means of mortar slurry.

For concrete and/or bluestone constructed within the vehicular travel way or driveway, a minimum of 24 hours curing time (from the last constructed) shall be required before vehicular use. The Contractor shall provide all signs, cones, and barricades necessary to protect the concrete and/or bluestone. **The Contractor shall notify Property owners or residents at least 24 hours prior to disturbing driveways.**

Wheelchair Ramps: Pavers shall be placed at slopes as shown in the detail drawings which comply with the Americans with Disabilities Act Standards (ADA). Pavers shall be cut such that the "ramp" is constructed with two equal sized pieces with the joint running parallel to the direction of vehicular traffic as shown on the detail drawings.

The Contractor shall mark, in the field, the location of all openings needed for sign posts, hydrants, light poles, etc. Approval by the Engineer is required before any cutting of the pavers begins. The openings shall be created using suitable cutting tools to create the neat openings. If any of the openings are cut in an unapproved location, without the Engineers approval the Contractor shall replace the paver at his own expense. The openings in the pavers shall be cut to the appropriate shape with a maximum joint of 3/8 of an inch filled with mortar as specified above.

#### Procurement and Delivery:

The Contractor's attention is directed to the fact that the bluestone industry typically requires placement of orders, well in advance of the installation needs to ensure prompt delivery of the materials to the project site. The Contractor is strongly encouraged to provide the requested bluestone submittal for review and approval as soon as possible to ensure the timely placement of the order and the subsequent delivery of stone for installation. The first delivery of bluestone to the project site shall be made between 4 to 8 weeks after placement of the order. All subsequent deliveries of bluestone material shall be made between 2 to 4 weeks after the first delivery. Bluestone material may also be able to be shipped to the project site to coincide with the Contractor's schedule for sidewalk construction activities.

#### Storage and Handling:

The bluestone pavers shall be stored on wood pallets, covered with non-staining, waterproof membrane, and protected from weather, vandalism, and theft. It is the Contractor's responsibility to store and protect all materials until the work is complete and accepted. The storage area for materials must be approved in advance by the Engineer. The bluestone pavers shall be handled with care to prevent cracking, chipping, staining, breakage, or other damage. Any pavers damaged or stolen shall be replaced by the Contractor at his own expense. Bluestone pavers containing defects shall not be incorporated into the work and shall become the property of the Contractor.

#### Weather Limitations:

Construction of the concrete slab will be subject to the relevant conditions set forth in Section 601 of these Specifications. No pavers shall be set when the temperature is below 40 degrees or expected to fall below 40 degrees within 36 hours of completion of the day's work. The work is to be properly cured using methods approved by the Engineer. Care must be taken to keep the mortar moist during hot/dry weather. The work is to be protected from any weather conditions that may damage it, including rain. The completed work is to be left in a clean, workmanlike condition, acceptable to the Engineer.

### **METHOD OF MEASUREMENT**

Furnish and Install Bluestone Sidewalk and Crosswalk will be measured on a "Per Square Yard" basis by the area of sidewalk/roadway actually removed and installed in accordance with the Plans and/or as directed by the Engineer. Only the square yardage of the newly constructed sidewalk/roadway shall count towards the measurement of this item.

### **BASIS OF PAYMENT**

Remove and Reset Bluestone Sidewalks and Crosswalks shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) saw cutting, excavation and legal disposal, hauling, loading/unloading, furnish and installation of mortar, furnish and installation of required bluestone, mortar filling the joints, clean-up, the legal disposal of all surplus excavated and/or unsuitable material and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

The excavation and disposal of sidewalk panels or concrete base material shall be included in this item. Furnish and Install Crushed Processed Gravel, Loam and Seed, and Bituminous Concrete Pavement Non-Mechanical shall be paid for under their respective items

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-9 FURNISH AND INSTALL BLUESTONE SIDEWALK E-10 FURNISH AND INSTALL BLUESTONE CROSSWALK**

#### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Bluestone Sidewalks and Crosswalks. All work shall be in accordance with the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

#### **MATERIALS**

Portland Cement Concrete shall be Class A as specified within Section 601 of The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, and either four (4) or six (6) inches in thickness depending on location and use.

6x6-W4xW4 welded wire fabric shall conform to Section M05.02.01 Wire Fabric, of the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions

Mortar for setting bed and joints shall conform to Section M.09.05.7, Mortar, of the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Only fresh mortar is to be used for this work. Mortar in which initial set has begun or is more than 30 minutes old, whichever comes first, shall be discarded and replaced with fresh mortar. No retempering of mortar will be permitted.

Bluestone pavers shall be clean, dense, uniformly colored, durable, even-grained stone, free from stains, cracks, chips, irregularities, weak fracture planes and any other defect that, in the opinion of the Engineer, will make the material unsuitable for the intended use. Bluestone pavers shall be sized in rectangular shapes:

- (a) 36 inches by 42 inches for sidewalks, wheelchair ramps, and driveways; and shall have a thickness of one half inches (1 1/2") with a tolerance of +/-1/8" within Washington Square, and
- (b) 24 inches by 36 inches for sidewalks, wheelchair ramps, and driveways; and shall have a thickness of one half inches (1 1/2") with a tolerance of +/-1/8" elsewhere.
- (c) 24 inches by 48 inches for crosswalks and have a thickness of two inches (2") with a tolerance of +/-1/8" within Washington Square.
- (d) Other sizes or thicknesses may be substituted as described in the Contract Documents, shown in the drawing/plans, and/or as directed by the Engineer. This item title may be changed for a specific Contract

The pavers are to be thermal finished to create a non-slip surface, blue-grey in color, and shall be from one supply source to ensure the color consistency of the pavers. The bluestone shall be

diamond sawed with a smooth surface. All edges shall be cut perfectly square, except where miter cuts are necessary to form the wheelchair ramp pavers. All cuts shall be straight and true. The thermal "light flame" finish must be performed during the fabrication of the pavers and must not adversely affect the performance, durability or color of the stones.

All sidewalks shall have a concrete base of four (4) inches in thickness. All driveways, wheelchair ramps, and crosswalks shall have a concrete base of six (6) inches in thickness.

Portland Cement Concrete used for other items such as curb lock, utility castings, or at locations directed by the Engineer shall be included as incidentals to the respective item.

## **CONSTRUCTION METHOD**

It shall be the responsibility of the Contractor to carefully remove the designated concrete so as not to damage any adjacent concrete not intended for removal. If any damage occurs to such slabs, it shall be the responsibility of the Contractor to replace those slabs with new concrete at his expense. The sidewalk slabs that are to be replaced will be marked by the Engineer and all joints between new work and existing slabs shall be cut straight with the use of a saw.

Any damage caused by excavation of a sidewalk or the carelessness deemed so by the Engineer shall be the sole responsibility of the Contractor. Care shall be taken when excavating any sidewalk or objects as to no disturb existing buildings, foundations, utilities, or any other existing structure etc.

The Contractor shall also exercise due care not to injure trees during excavation. The Contractor shall protect trees with boards, burlap, padding or other protective material as may be required to avoid injury. After the existing concrete has been removed, roots within the construction area shall remain undisturbed unless otherwise directed by the City Tree Warden. The Contractor shall not begin constructing the sidewalk in the areas within the drip line of a tree until the City of Newport Tree Warden has inspected the tree roots and determines whether the roots need to be pruned. If pruning is deemed necessary by the Tree Warden, all pruning will be completed by the Contractor at the direction of the Tree Warden before construction of the sidewalk begins. All work shall be done as directed by the City Tree Warden or his designee.

Where the areas to be replaced contain manhole covers, curb boxes, or other utility structures, it shall be the responsibility of the Contractor to properly reset those utilities to grade, or to contact the respective utility company for them to do the same. Payment for this procedure is to be included under their respective items.

The work of these items must be performed in a careful, professional manner suitable for the historic character of the area. The subject work is to be accomplished by skilled craftsmen with demonstrated experience in the installation of comparable historic and/or specialty pavements in accordance with the details shown on the plans, these contract specifications and as directed by the Engineer. Bluestone sidewalk shall be installed such that only one block is under construction and is being impacted at any one given time. Removal of existing sidewalk in front of business/commercial establishments shall not be permitted until the required amount of

bluestone for a given block has been delivered to the project site and is available for installation by the Contractor.

It shall be the responsibility of the Contractor to immediately remove from the site all excavated material and to dispose of it in the proper and legal manner.

Installation sequence for the new bluestone sidewalks and wheelchair ramps shall be as follows: Excavate and remove existing sidewalk materials to proposed subgrade elevation and compact the subgrade. Install a four (4") inch or six (6") inch thick, reinforced concrete slab (with 6x6-W4xW4 welded wire fabric embedded 2" above gravel subgrade). The Contractor shall provide 1/2" expansion joints, as shown on the plans, in the concrete slab and bluestone pavers every 37'- 3"± feet with preformed expansion joint filler conforming to AASHTO-M153. Provide construction joints every 12'-5"± feet in the concrete slab. Provide control joint at approximate midpoint of sidewalk width, at nearest paver joint. Preformed expansion joint filler shall be placed through the concrete slab, mortar bed and between bluestone paver joints. Construction and control joints for the concrete slab shall be located under mortar joints in the bluestone pavers following the joint pattern as detailed on the project plans and as shown on the approved bluestone layout submitted by the Contractor. Pavers are to be set with 1/2" joints with a 1/16" tolerance.

Pavers shall be placed in a running bond pattern such that the joints are either perpendicular or parallel to the curb line and off set one half stone. A preformed expansion joint filler conforming to AASHTO-M153 shall be placed between the bluestone pavers and when matching existing buildings, foundations, utilities, or any other existing structure etc.

Place the 1" mortar bedding over concrete slab immediately before setting the pavers such that the entire paver is sitting in the mortar with no voids. The concrete slab and pavers are to be in "saturated-surface dry condition" when the mortar and pavers are placed. Pavers shall be properly seated on the mortar bed using suitable mallets or other tools. Joints shall be pointed flush with the tops of the pavers. Care shall be taken to avoid mortar stains on the tops of the pavers such as tape masking and sponge cleaning. Mortar dropped on the bluestone surface must be immediately and completely removed. The Contractor must protect the work from pedestrian, vehicular or any other form of damage until the work is accepted. Mortared joints shall not be filled by means of mortar slurry.

For concrete and/or bluestone constructed within the vehicular travel way or driveway, a minimum of 24 hours curing time (from the last constructed) shall be required before vehicular use. The Contractor shall provide all signs, cones, and barricades necessary to protect the concrete and/or bluestone. **The Contractor shall notify Property owners or residents at least 24 hours prior to disturbing driveways.**

Wheelchair Ramps: Pavers shall be placed at slopes as shown in the detail drawings which comply with the Americans with Disabilities Act Standards (ADA). Pavers shall be cut such that the "ramp" is constructed with two equal sized pieces with the joint running parallel to the direction of vehicular traffic as shown on the detail drawings.

The Contractor shall mark, in the field, the location of all openings needed for sign posts, hydrants, light poles, etc. Approval by the Engineer is required before any cutting of the pavers

begins. The openings shall be created using suitable cutting tools to create the neat openings. If any of the openings are cut in an unapproved location, without the Engineers approval the Contractor shall replace the paver at his own expense. The openings in the pavers shall be cut to the appropriate shape with a maximum joint of 3/8 of an inch filled with mortar as specified above.

#### Procurement and Delivery:

The Contractor's attention is directed to the fact that the bluestone industry typically requires placement of orders, well in advance of the installation needs to ensure prompt delivery of the materials to the project site. The Contractor is strongly encouraged to provide the requested bluestone submittal for review and approval as soon as possible to ensure the timely placement of the order and the subsequent delivery of stone for installation. The first delivery of bluestone to the project site shall be made between 4 to 8 weeks after placement of the order. All subsequent deliveries of bluestone material shall be made between 2 to 4 weeks after the first delivery. Bluestone material may also be able to be shipped to the project site to coincide with the Contractor's schedule for sidewalk construction activities.

#### Storage and Handling:

The bluestone pavers shall be stored on wood pallets, covered with non-staining, waterproof membrane, and protected from weather, vandalism, and theft. It is the Contractor's responsibility to store and protect all materials until the work is complete and accepted. The storage area for materials must be approved in advance by the Engineer. The bluestone pavers shall be handled with care to prevent cracking, chipping, staining, breakage, or other damage. Any pavers damaged or stolen shall be replaced by the Contractor at his own expense. Bluestone pavers containing defects shall not be incorporated into the work and shall become the property of the Contractor.

#### Weather Limitations:

Construction of the concrete slab will be subject to the relevant conditions set forth in Section 601 of these Specifications. No pavers shall be set when the temperature is below 40 degrees or expected to fall below 40 degrees within 36 hours of completion of the day's work. The work is to be properly cured using methods approved by the Engineer. Care must be taken to keep the mortar moist during hot/dry weather. The work is to be protected from any weather conditions that may damage it, including rain. The completed work is to be left in a clean, workmanlike condition, acceptable to the Engineer.

### **METHOD OF MEASUREMENT**

Furnish and Install Bluestone Sidewalk and Crosswalk will be measured on a "Per Square Yard" basis by the area of sidewalk/roadway actually removed and installed in accordance with the Plans and/or as directed by the Engineer. Only the square yardage of the newly constructed sidewalk/roadway shall count towards the measurement of this item.

### **BASIS OF PAYMENT**

Furnish and Install Bluestone Sidewalk and Crosswalks shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not

limited to) saw cutting, excavation and legal disposal, placing and compacting Crushed Processed Gravel or Excess Reclaimed Material as directed by the Engineer, hauling, loading/unloading, trimming and fine grading, mechanical compaction, setting forms, and furnishing, placing Portland Cement Concrete to the required thickness with welded wire, then removing forms, backfilling, furnish and installation of mortar, furnish and installation of required bluestone, mortar filling the joints, clean-up, the legal disposal of all surplus excavated and/or unsuitable material and all other incidentals required to finish the work, complete and accepted by the Engineer. Any castings damaged due to carelessness shall be replaced at the Contractors expense.

The excavation and disposal of sidewalk panels or concrete base material shall be included in this item. Furnish and Install Crushed Processed Gravel, Loam and Seed, and Bituminous Concrete Pavement Non-Mechanical shall be paid for under their respective items.

## **CITY SPECIFICATIONS**

### **SECTION E – SIDEWALK WORK**

#### **E-11 REMOVE AND STOCKPILE BLUESTONE SIDEWALK**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Remove and Stockpile Bluestone Sidewalks. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. Stockpiled curbing shall be used by the Contractor when necessary. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

The Contractor shall protect removed sidewalk from damage and store them in a safe manner. Any bluestone damaged due to carelessness shall be replaced at the Contractors expense.

##### **MATERIALS**

All materials removed and stockpiled shall be palletized, wrapped, and delivered to the City Yard, 80 Halsey Street.

##### **CONSTRUCTION METHOD**

Bluestone Sidewalks to be Removed and Stockpiled shall be designated as such in the field by the Engineer. Any other bluestone deemed unusable by the Engineer ahead of time shall be disposed of by the Contractor under the respective sidewalk item.

Contractors shall use careful means of removal so as not to damage the bluestone. The Contractor should use straps instead of excavator buckets to remove the bluestone and palletize the stone. Any stone that is deemed unusable by the Engineer, due to damage caused by the Contractor, shall be disposed of at the Contractor's expense. All base material shall be removed and disposed unless otherwise directed by the Engineer.

##### **METHOD OF MEASUREMENT**

Remove and Stockpile Bluestone Sidewalk will be measured on a "Per Square Yard" basis by the area of such stones actually removed stockpiled in good condition in accordance with the Plans and/or as directed by the Engineer.

##### **BASIS OF PAYMENT**

Remove and Stockpile Bluestone Sidewalk shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) saw cutting, excavation, loading, hauling, stockpiling, the legal disposal of all surplus excavated

and/or unsuitable material and unusable stone/base material, and all other incidentals required to finish the work, complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION F – FINISH WORK**

#### **F-1 FURNISH AND INSTALL LOAM BORROW 4" DEEP F-2 FURNISH AND INSTALL RESIDENTIAL SEEDING (TYPE 2)**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Loam Borrow 4" Deep and Residential Seed (Type 2). All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures.

##### **MATERIALS**

Loam, Plantable Soil and High Organic Soil shall be clean and free of any undesirable material and conform to the applicable requirements of SECTION M.18; LANDSCAPING MATERIALS of the Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

##### **CONSTRUCTION METHOD**

Prior to the placement of loam the Contractor shall prepare the surface to receive the loam. All roots, sod, weeds, cobbles or stone with any dimension greater than 1 inch shall be removed and legally disposed of.

Loam shall be placed on surfaces which are true to the lines, grades, and cross-sections shown on the Plans or established by the Engineer. Loam shall be placed and spread to the required depth of four (4) inches.

The loamed surface shall be graded, and all roots, sods, weeds, cobbles or stones with any dimension greater than one (1) inch shall be removed and legally disposed of. After shaping and grading, all trucks and other equipment not required to perform seeding, mulching or mowing operations shall be excluded from the loamed areas.

The loam shall be furnished by the Contractor from sources outside of the project limits.

All loamed areas shall be seeded no more than two weeks after spreading the loam. Refer to SECTION L.02; SEEDING, of the RIDOT Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions, for dates and other requirements. Loamed areas shall be maintained, free from erosion until acceptance of the project.

Full advantage shall be taken of time and weather conditions best suited for seeding. The normal dates for seeding shall be as follows: Spring Seeding April 1 to May 31 and Fall Seeding August 15 to October 15.

All areas shall be hand raked to a finished grade. All sticks, litter, wire, weeds, cable, cobbles and stones larger than 1/2-inch in any dimension shall be removed and legally disposed of. After hand raking, and at the discretion of the Engineer, the Contractor shall roll, with a hand roller, the entire area. The finish grade of the proposed area shall blend into the adjacent lawns (when applicable).

Where the seed bed has become compacted, it shall be scarified to a depth of four (4) inches prior to fine raking. No seeding of this type will be permitted on areas where the seed bed has not been properly prepared or where the soil is compacted.

All seeded areas shall be seeded with a Residential Seed Mix. Additional hand raking and rolling with a light roller shall be employed in lieu of mulch. Such areas will not be accepted until a generally weed-free, 3-inch stand of grass is established.

### **METHOD OF MEASUREMENT**

Furnish and Install Loam Borrow 4" Deep and Residential Seeding (Type 2) will be measured on a "Per Square Yard" basis by the area of turf actually installed and restored in accordance with the Plans and/or as directed by the Engineer.

### **BASIS OF PAYMENT**

Furnish and Install Loam Borrow 4" Deep and Residential Seeding (Type 2) shall be paid for at the respective contract unit prices "Per Square Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) preparation of seed beds, for furnishing and applying all lime, fertilizer, mulch, seed, raking, mowing, watering, and care during construction of the seeded areas, and any other incidentals associated with the work complete and accepted by the Engineer.

Eighty-five (85) percent of the total contract price will be paid at the time of initial seeding. The remainder, 15 percent, will be paid when the newly seeded areas have been accepted. If seeding is done at a time other than the specified seeding date, the entire payment for seeding will be withheld until a uniform acceptable stand of turf, as determined by the Engineer, has been obtained

## CITY SPECIFICATIONS

### SECTION F – FINISH WORK

#### F-3 FURNISH AND INSTALL STONE DUST TREE WELL

##### DESCRIPTION

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Stone Dust Tree Well. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions. The Contractor shall notify the various utility companies (gas, water, electric, telephone, etc.) to coordinate work on or near their respective structures. The City Tree Warden shall also be notified whenever working within the drip line of a city tree.

##### MATERIALS

Select leveling and filler aggregate shall be a composite of crushed or uncrushed coarse aggregate and natural or crushed fine aggregate, all provided from approved sources (preferably made from crushed bluestone). The composite aggregate shall be free of compressible or organic soils, soft or elongated rock fragments or gravel, and vegetative matter.

Fine aggregate may consist of natural sand or particles produced by crushing rock or gravel, and shall be free of organic soils or other deleterious matter.

The composite coarse and fine aggregate mix shall conform to the following gradation requirements:

Square Mesh Sieve Size:	Percentage by Weight Passing Indicated Sieve Size:
1½"	100
1"	70 - 100
¾"	50 - 85
⅜"	40 - 75
No. 4	30 - 55
No. 40	0 - 25
No. 200	0 - 8

##### CONSTRUCTION METHOD

In cases where a tree obstructs the construction of a proper width sidewalk, a tree well shall be constructed around the base to provide pedestrian with a smooth, firm, and slip resistant surface to walk on. All roots, sod, weeds, cobbles or stone with any dimension greater than 1 inch shall be removed and legally disposed of. The stone dust surface shall be graded, and all roots, sods, weeds, cobbles or stones with any dimension greater than one (1) inch shall be

removed and legally disposed of. After shaping and grading, the stone dust material shall be mechanically compacted.

#### **METHOD OF MEASUREMENT**

Furnish and Install Stone Dust Tree Well will be measured on a "Per Cubic Yard" basis by the volume of tree well actually installed and restored in accordance with the Plans and/or as directed by the Engineer.

#### **BASIS OF PAYMENT**

Furnish and Install Stone Dust Tree Well shall be paid for at the respective contract unit prices "Per Cubic Yard" as listed in the Proposal. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) excavation and legal disposal of concrete sidewalk, mechanical compaction, furnish and placement of bluestone stone dust material, and any other incidentals associated with the work complete and accepted by the Engineer.

## **CITY SPECIFICATIONS**

### **SECTION G – TRAFFIC CONTROL**

#### **G-1 FURNISH AND INSTALL TRAFFIC CONTROL DEVICES**

#### **G-2 POLICE TRAFFIC CONTROL**

##### **DESCRIPTION**

The Contractor shall furnish all labor, materials, tools, and equipment necessary to Furnish and Install Traffic Control Devices and coordinate Police Traffic Control from the Newport Police Department as directed by the Engineer, in order to direct traffic and for detours as required by the progress of work. A police detail shall be made available at an excavation site, intersection or at a point of detour. All work shall be in accordance with The Rhode Island Standard Specifications for Road and Bridge Construction, amended December 2010 with all latest revisions.

##### **MATERIALS**

The Contractor shall furnish, erect, maintain, wash, move, adjust, repair, relocate, re-erect, and store all temporary construction signs, sign mountings, portable barricades, traffic cones, delineators, and other warning devices when, where, and as specified by the Standard Specifications for Road and Bridge Construction of the State of Rhode Island, amended December 2010 with all latest revisions, and the Manual on Uniform Traffic Control Devices, latest edition or as otherwise directed by the Engineer. Temporary construction signs, sign mountings and other warning devices shall conform to the Standard Specifications for Road and Bridge Construction of the State of Rhode Island, Revision of 2004 and the Manual on Uniform Traffic Control Devices, latest edition. When, in the opinion of the City, the sign or device shall be so severely damaged as to warrant replacement, the Contractor shall provide a new device that shall be deemed to be included in this item.

##### **CONSTRUCTION METHOD**

Furnish and Install Traffic Control Devices shall cover all work related to the furnishing, installation, maintenance, and movement of traffic protective devices on the project. The Contractor shall provide a sufficient number of signs and other warning devices as required by the nature of the work as determined by the Contractor or as directed by the City.

The Contractor shall keep all signs, barricades, and other protective devices in proper position, clean, and legible at all times. Care shall be taken so that weeds, shrubbery, construction materials and equipment, and spoil are not allowed to obscure any sign, lights, or barricade. Signs that do not apply to existing conditions shall be removed or adjusted so that the legend is not visible to approaching traffic. All signs and markers shall indicate actual conditions existing and shall be moved, removed, or changed immediately, as conditions require. When construction is not in progress, all unnecessary signs will be adequately covered.

If, in the opinion of the City, if adequate traffic control or warning devices are not provided or maintained by the Contractor, the City may order the Contractor to cease work until adequate

traffic control is provided. An extension of time will not be granted for delay caused by such an order to cease work.

### **METHOD OF MEASUREMENT**

Furnish and Install Traffic Control Devices will be measured on a "Per Lump Sum" basis in accordance with the Plans and/or as directed by the Engineer. Police Traffic Control will be measured on a "Per Hour" basis by the number of Police Detail hours actually served by an officer on duty, with a four hour minimum per detail per day in accordance with the Plans and/or as directed by the Engineer.

### **BASIS OF PAYMENT**

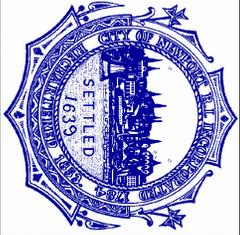
Furnish and Install Traffic Control Devices shall be paid for at the respective contract unit price "Per Lump Sum" as listed in the Proposal. Interim payments shall be based on the percentage of the contract completed. If, after notice by the City, signage is determined to be inadequate, the City may withhold payment on this item until it is addressed satisfactorily by the Contractor. The prices so-stated constitute full and complete compensation for all labor, materials, and equipment associated with (but not limited to) furnishing, erecting, maintaining, washing, movement, adjustment, repair, relocation, re-erection, storing of all temporary construction signs, sign mountings, portable barricades, traffic cones, delineators, and all other warning devices, clean-up, legal disposal of all materials, and all other incidentals required to finish the work, complete and accepted by the Engineer. Any damage due to carelessness shall be the Contractor's responsibility. The cost for providing Police Traffic Control Devices shall not be included under Furnish and Install Traffic Control Devices. Police Traffic Control shall be paid for at the contract unit price "Per Hour" as listed in the Proposal. The prices so-stated constitute full and complete compensation for providing the required police services during the Contractors' operations. All payments for Police Traffic Control shall be made by the City of Newport and not by the Contractor under this Contract.

**CITY OF NEWPORT, RHODE ISLAND**  
**DEPARTMENT OF PUBLIC SERVICES**



**CITY STANDARD DETAILS FOR  
CONSTRUCTION WITHIN CITY RIGHT-OF-WAY**

**January 5, 2011**

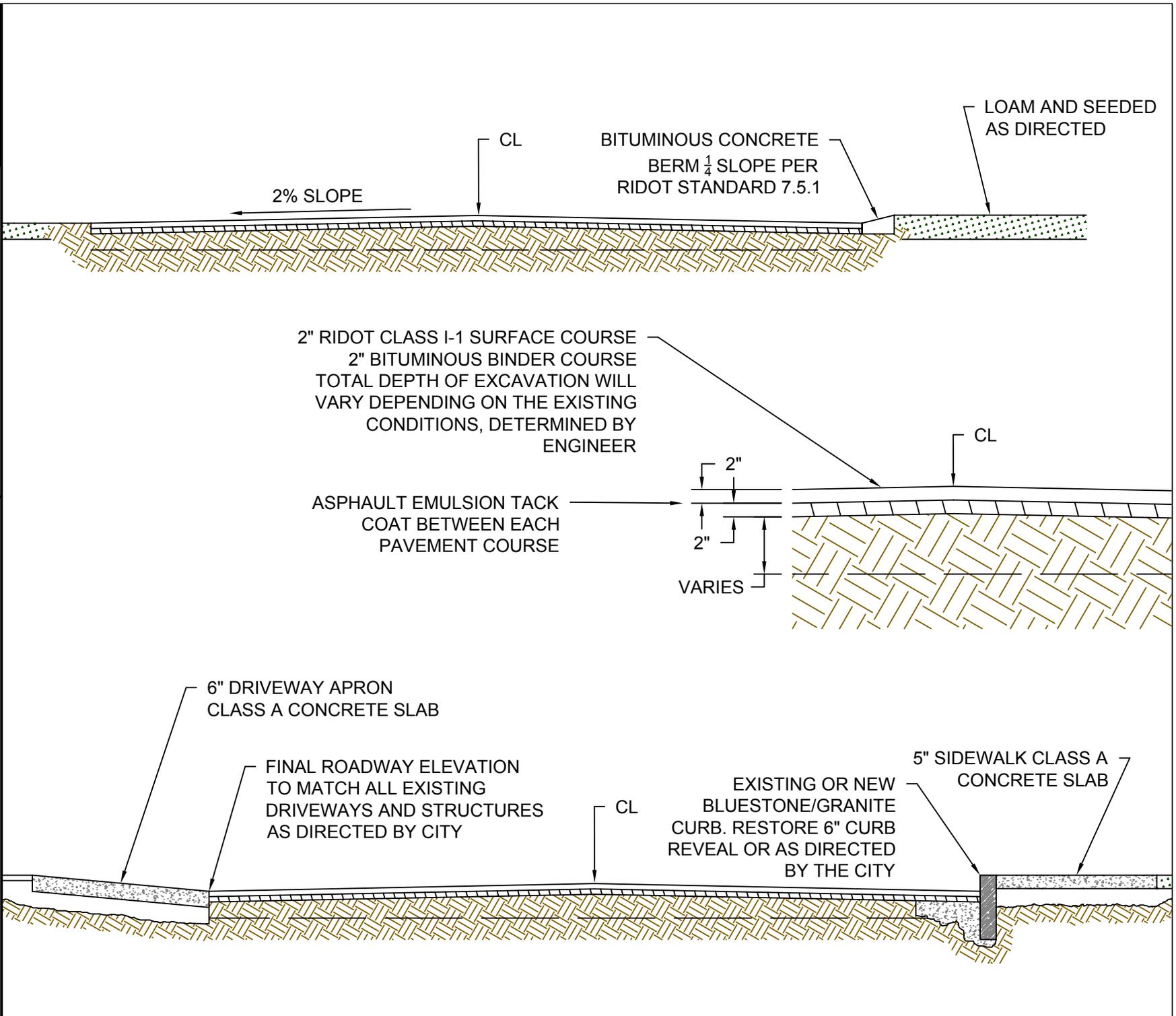


**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES  
DRAWN BY FJM

REVISION DATE:  
MARCH 2011

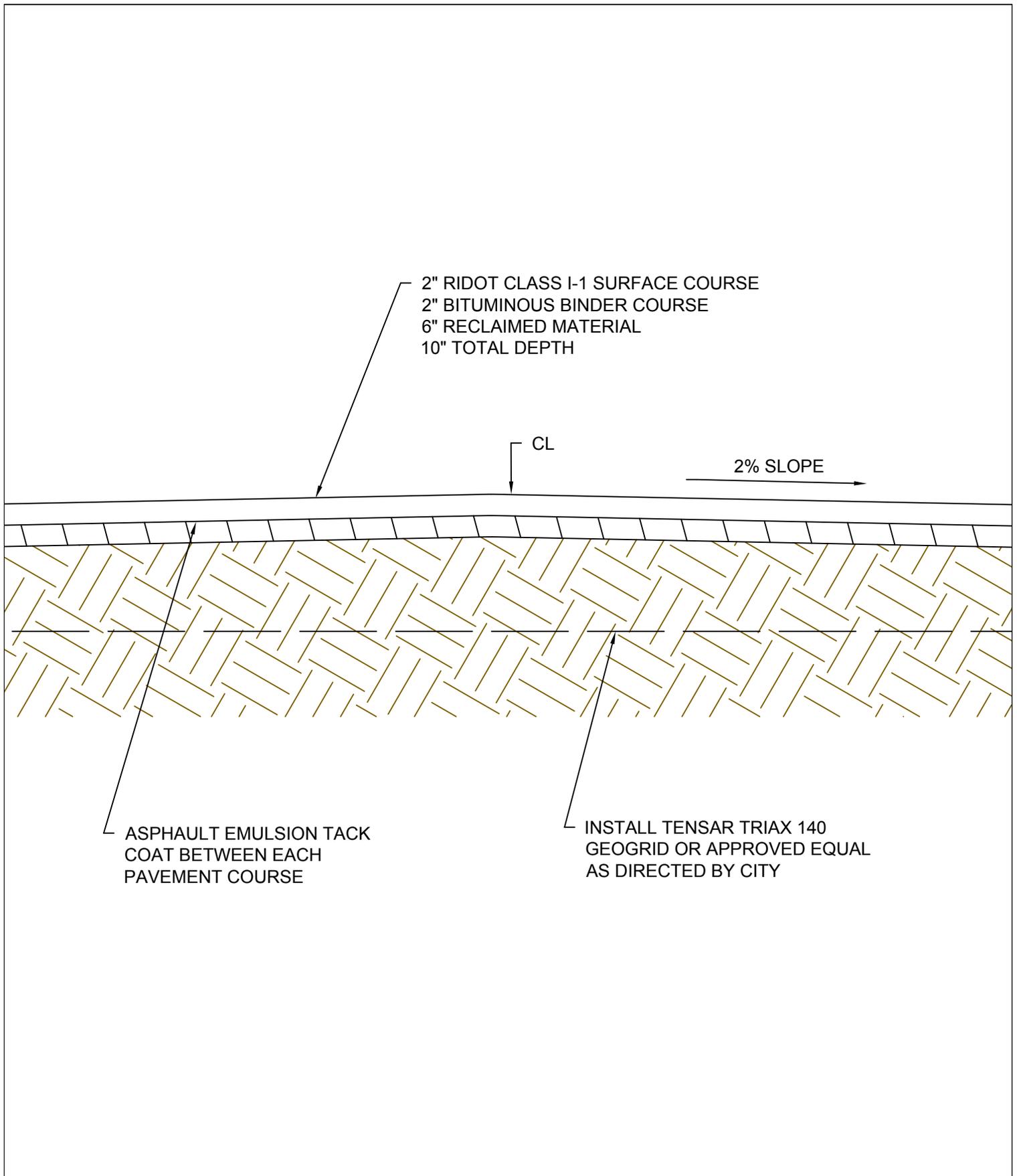
SCALE  
1"=4'

FIGURE  
1.01



CITY SPECIFICATIONS

TYPICAL ROADWAY SECTION DETAIL



**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC SERVICES

DRAWN BY FJM

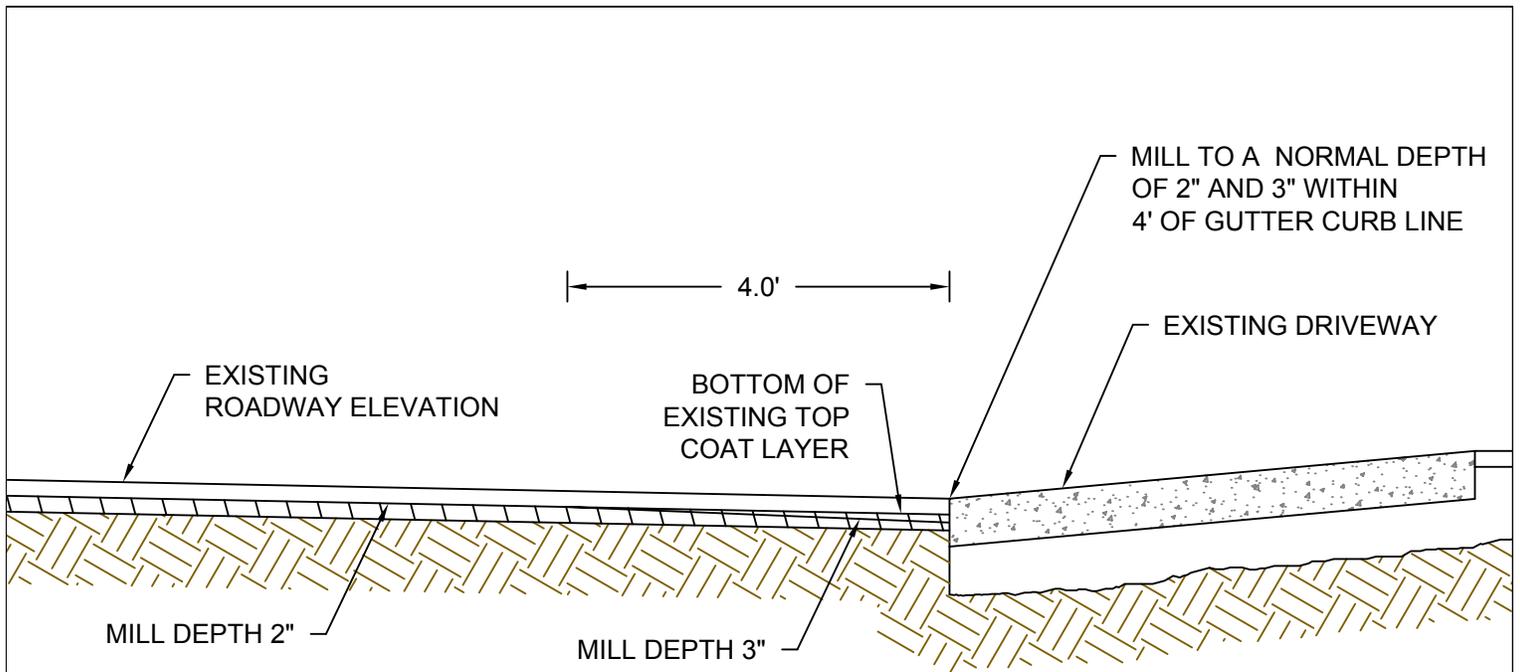
CITY SPECIFICATIONS

RECLAMATION AND OVERLAY DETAIL

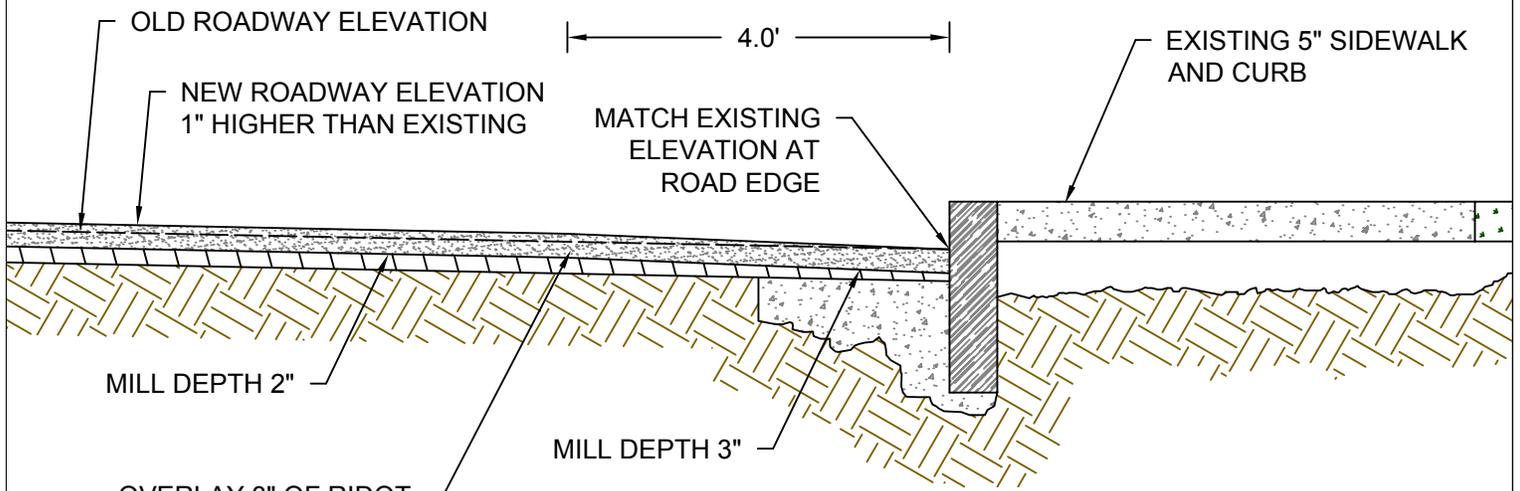
REVISION DATE:  
 MARCH 2011

SCALE  
 1"=1'

FIGURE  
 1.02



**COLD PLANE**



NOTE: APPLY EMULSION TACK COAT TO ENTIRE COLD PLANED ROADWAY

**OVERLAY**



**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC  
 SERVICES

DRAWN BY FJM

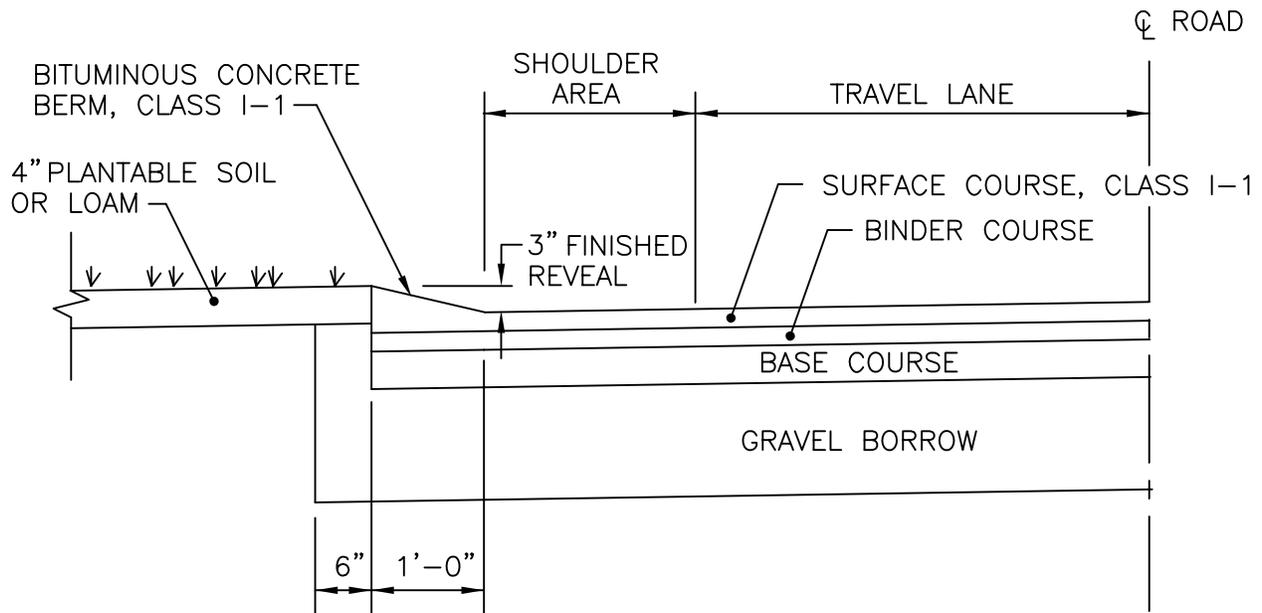
CITY SPECIFICATIONS

COLD PLANE AND OVERLAY DETAIL

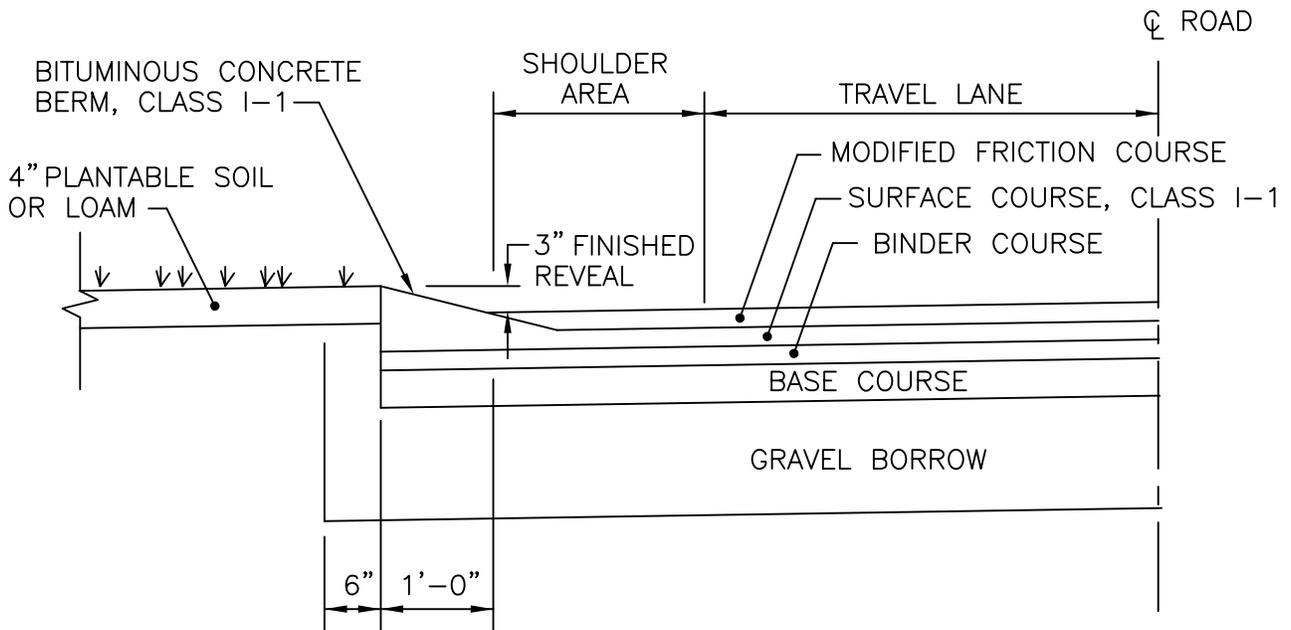
REVISION DATE:  
 MARCH 2011

SCALE  
 1"=2'

FIGURE  
 1.03



**CONSTRUCTION METHOD A**



**CONSTRUCTION METHOD B**

**NOTES:**

1. SHALL BE IN ACCORDANCE WITH SECTION 906 OF THE R.I. STANDARD SPECIFICATIONS.
2. BITUMINOUS BERM CAN BE PLACED AT THE SAME TIME THAT THE SURFACE COURSE LAYER IS PLACED ON THE PROJECT ROADWAY, OR IT CAN BE INSTALLED IN A SEPARATE OPERATION.

**RHODE ISLAND DEPARTMENT OF TRANSPORTATION**

REVISIONS		
NO.	BY	DATE
1	MLP	Mar 05

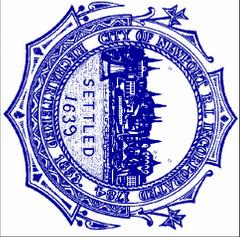
**BITUMINOUS BERM**

*James N. Casaldi*  
 CHIEF ENGINEER  
 TRANSPORTATION

*Edmund J. Perkins Jr.*  
 CHIEF DESIGN ENGINEER  
 TRANSPORTATION

JUNE 15, 1998  
 ISSUE DATE



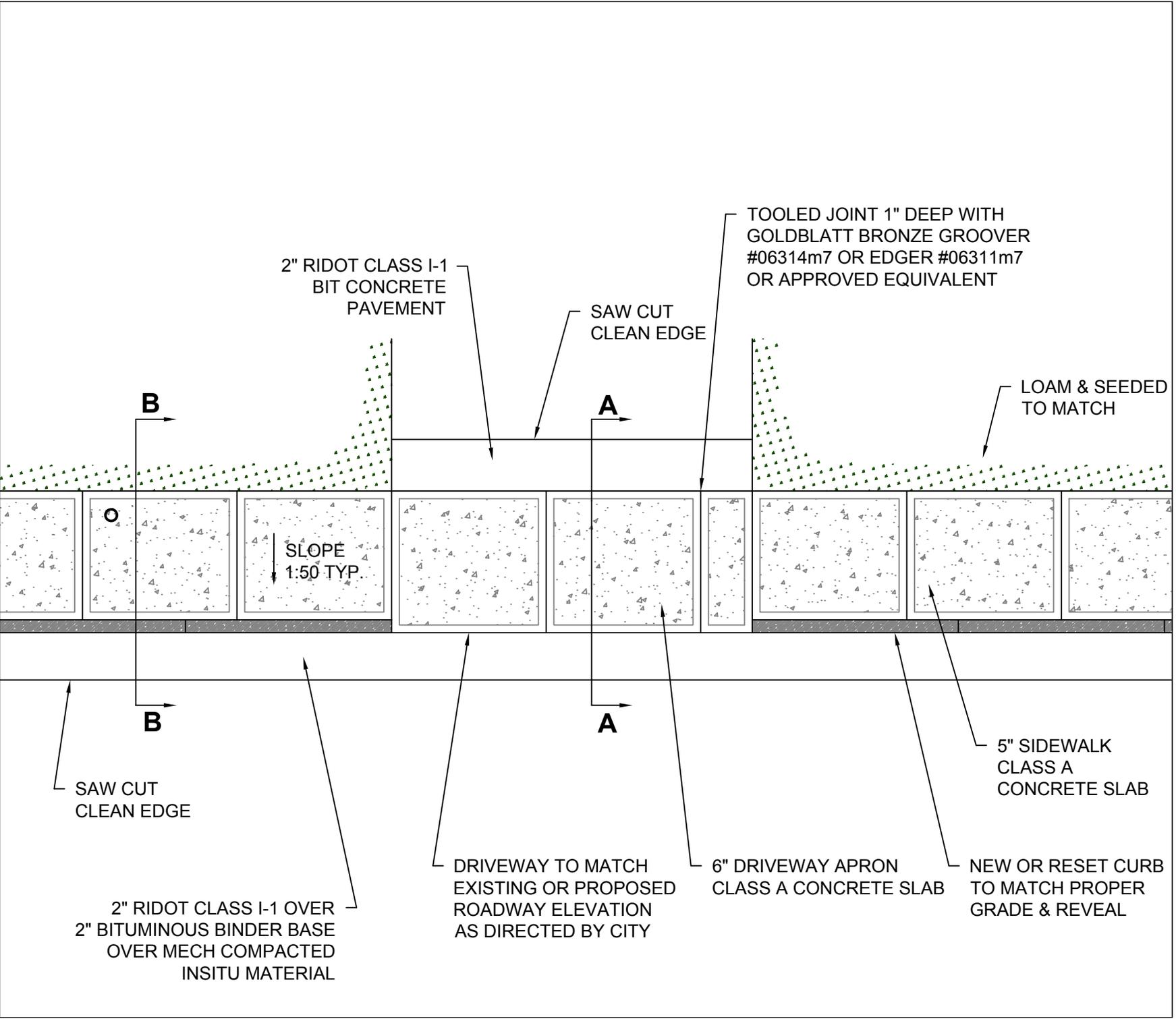


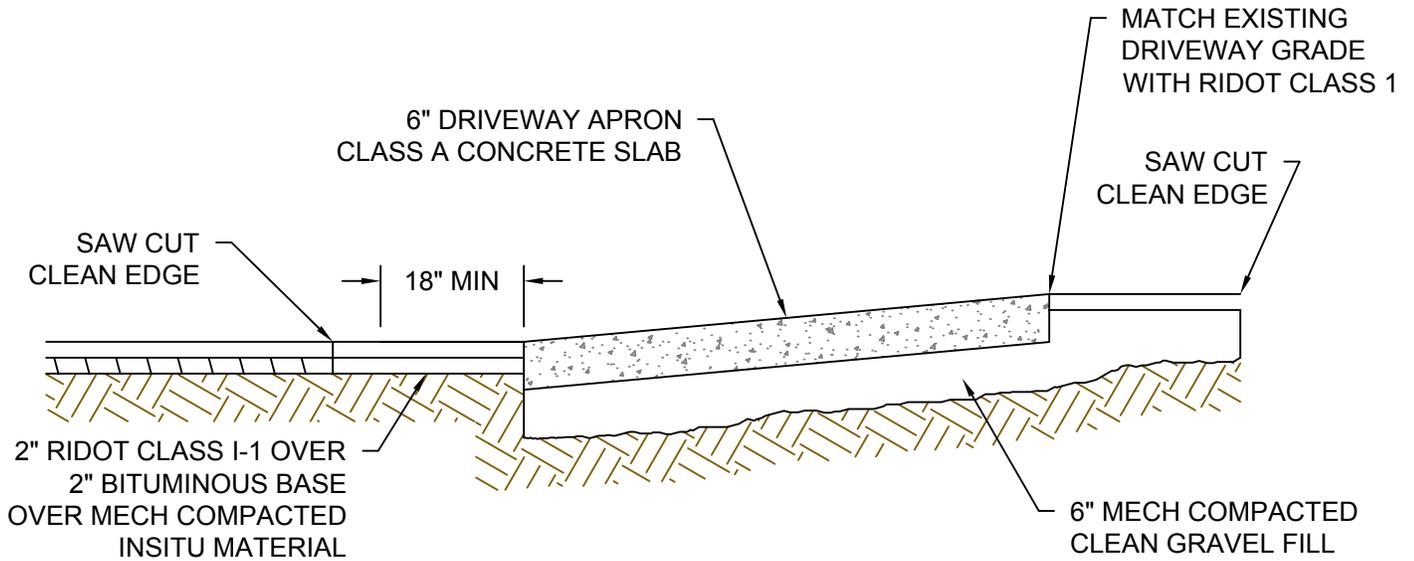
**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC SERVICES  
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REVISION DATE:  
 MARCH 2011

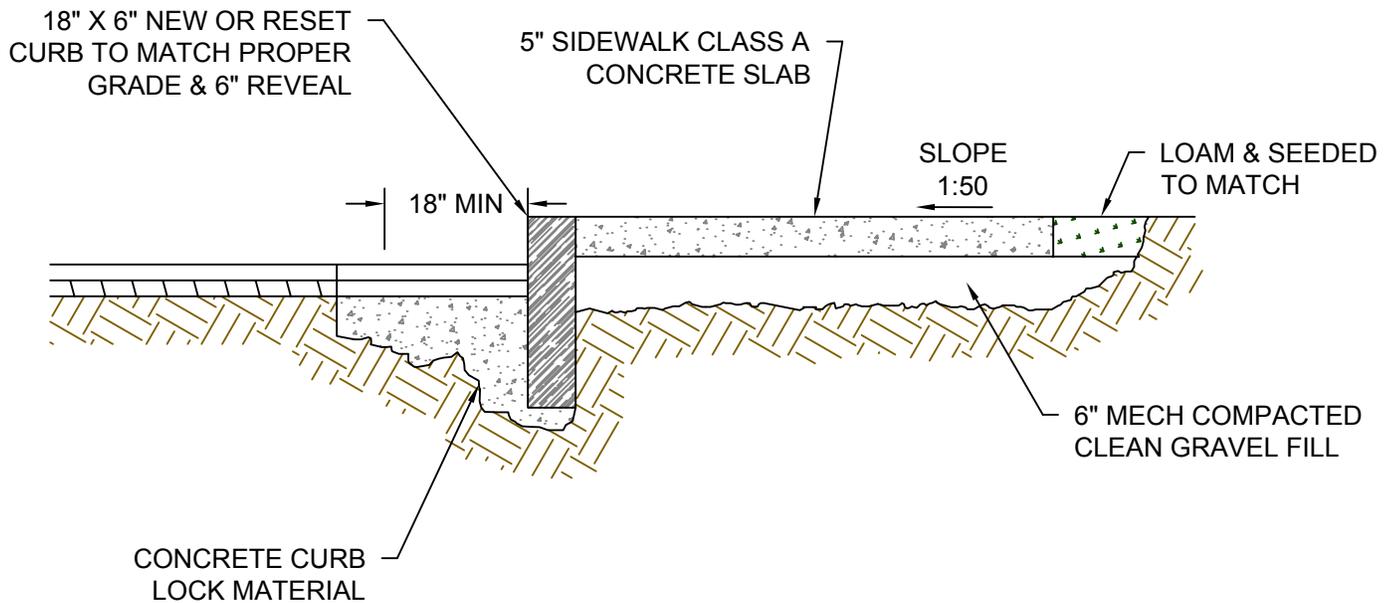
SCALE  
 1"=5'

FIGURE  
 2.01





**CONCRETE DRIVEWAY APRON A-A**



**CONCRETE SIDEWALK B-B**



**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC SERVICES

DRAWN BY FJM

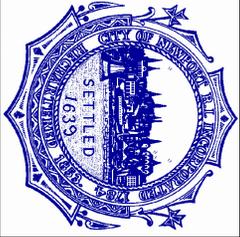
CITY SPECIFICATIONS

CONCRETE SIDEWALK CROSS-SECTION DETAIL

REVISION DATE:  
 MARCH 2011

SCALE  
 1"=2'

FIGURE  
 2.02



**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC  
 SERVICES

DRAWN BY FJM

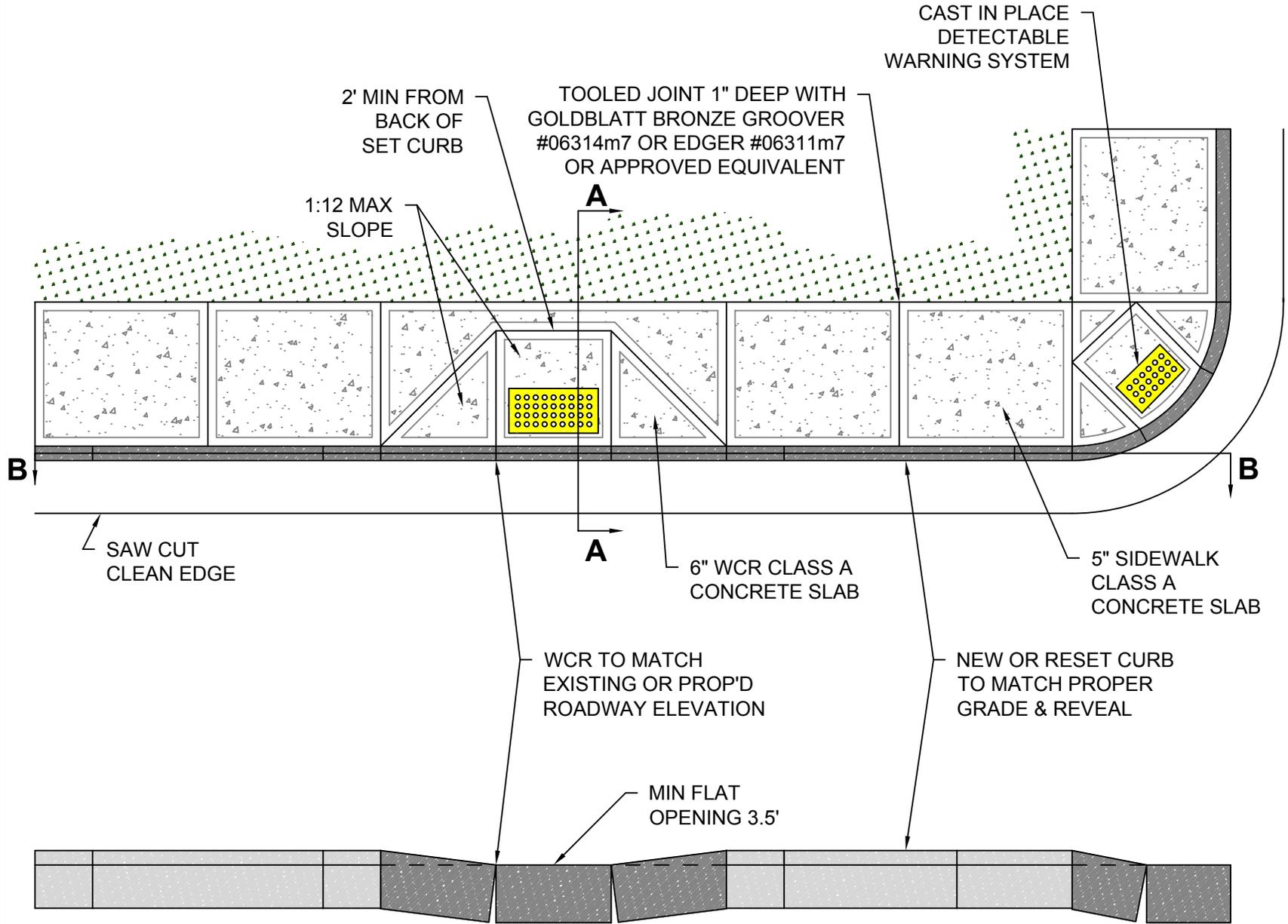
REVISION DATE:  
 MARCH 2011

SCALE  
 1"=5'

FIGURE  
 3.01

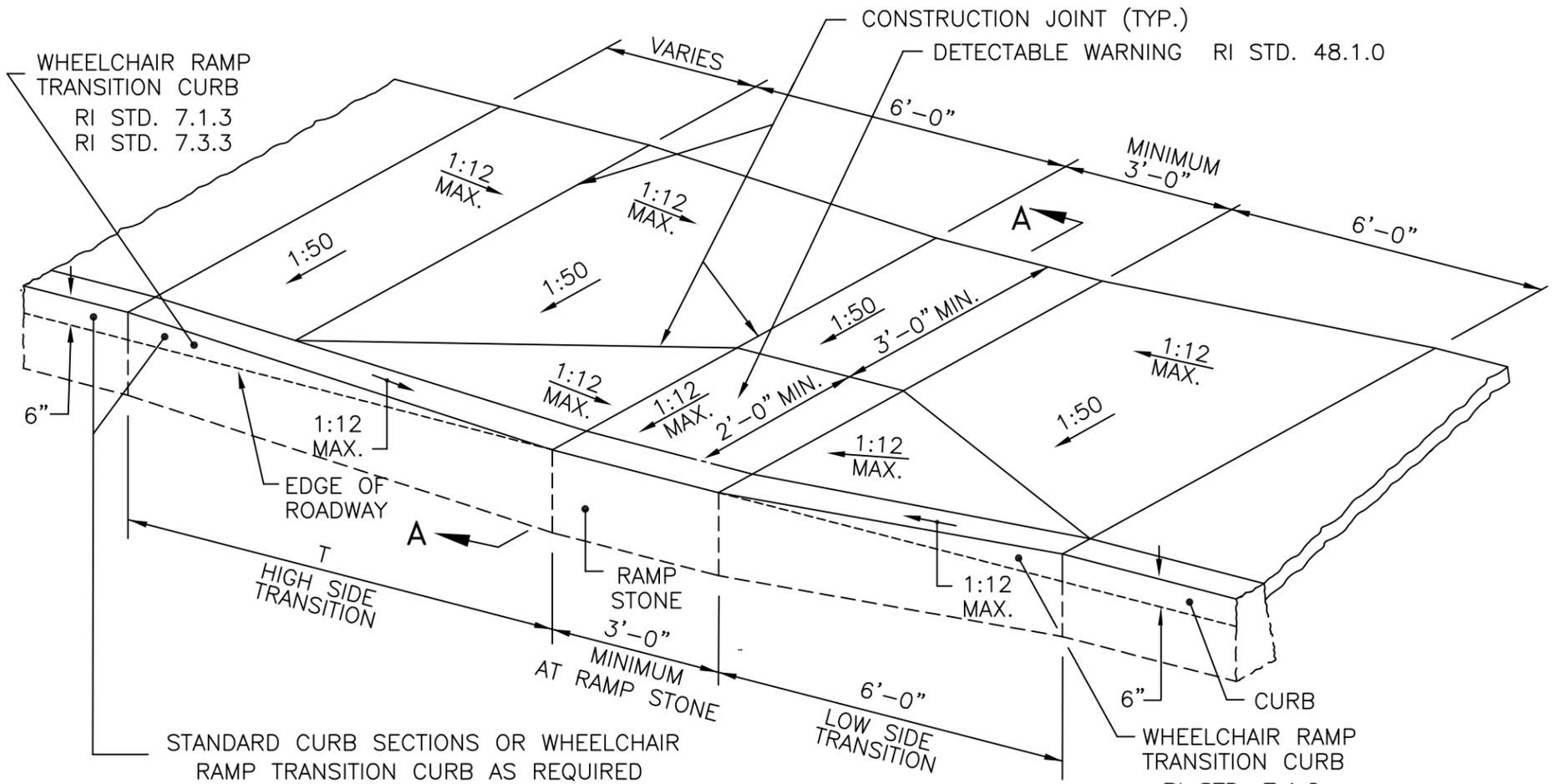
CONCRETE WCR SIDEWALK DETAIL

CITY SPECIFICATIONS

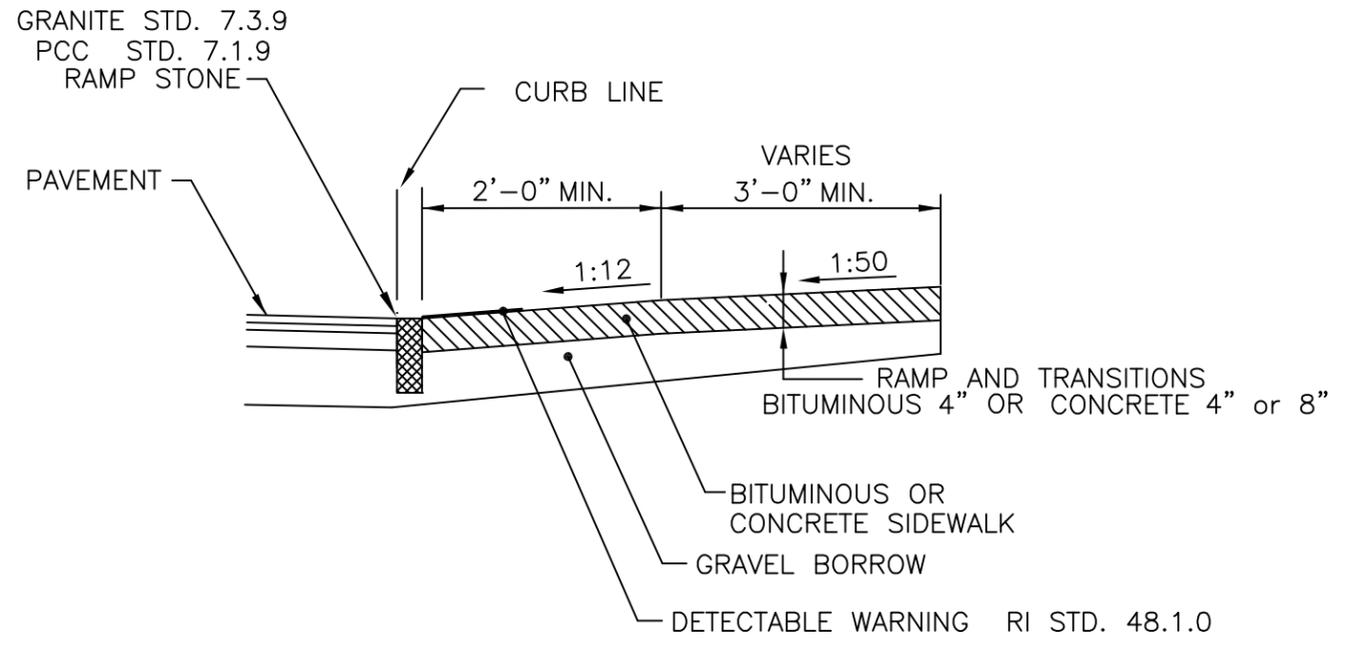


**WCR SIDEWALK B-B**

NOTE: REFER TO RIDOT STANDARD # 43.3.0 AND # 43.3.1



**ISOMETRIC VIEW**  
NOT TO SCALE



**SECTION A-A**  
NOT TO SCALE

ROADWAY PROFILE GRADE	T (FT.)
0.00	6.0
0.01	7.0
0.02	8.0
0.03	9.5
0.04	11.5
0.05	15.0

- NOTES:**
1. SHALL BE IN ACCORDANCE WITH SECTION 905 OF THE RI STANDARD SPECIFICATIONS.
  2. WHEN ANY OBSTRUCTION LOCATED IN THE SIDEWALK FALLS WITHIN A CROSSWALK AREA, THE WHEELCHAIR RAMP WILL BE PLACED SUCH THAT THE OBSTRUCTION FALLS OUTSIDE OF THE RAMP.
  3. AT NO TIME IS ANY PART OF THE WHEELCHAIR RAMP TO BE LOCATED OUTSIDE OF THE CROSSWALK, AND IT IS TO BE CENTERED WHENEVER POSSIBLE.
  4. DRAINAGE FACILITIES ARE TO BE LOCATED UP-GRADE OF ALL WHEELCHAIR RAMPS.
  5. LOCATION OF WHEELCHAIR RAMPS IS AS SHOWN ON CONTRACT DRAWINGS.
  6. IN NO INSTANCE SHALL THE SIDEWALK CROSS SLOPE EXCEED 1:50 EXCEPT WITHIN THE RAMP AREA.
  7. AN UNOBSTRUCTED PATH OF TRAVEL WITH A MINIMUM WIDTH OF 3'-0" SHALL BE MAINTAINED.
  8. THE WHEELCHAIR RAMP SLOPE AND SIDE SLOPES (TRANSITIONS), MUST NOT EXCEED 1:12. HOWEVER, THESE SLOPES MAY BE FLATTER THAN 1:12 WHEN WARRANTED BY SURROUNDING CONDITIONS.
  9. WHERE THE ROAD PROFILE EXCEEDS 5% THE HIGH SIDE TRANSITION LENGTH (T) SHALL BE EIGHTEEN FEET (18'-0").
  10. IN NO CASE, WHERE A STOP LINE IS WARRANTED, SHALL A RAMP BE PLACED BEHIND THE STOP LINE.
  11. THE ENTRANCE OF THE WHEELCHAIR RAMP SHALL BE FLUSH WITH THE ROADWAY.
  12. THE WHEELCHAIR RAMP SHALL BE CENTERED RADIALLY, OPPOSITE THE RADIUS POINT WHEN POSSIBLE.
  13. MINIMUM LENGTH OF STRAIGHT OR CIRCULAR FILLER PIECES TO BE 3'-0" (GREATER LENGTHS PREFERRED).
  14. ALL REQUIRED CUTTING OF CURB PIECES TO BE PAID FOR UNDER COST OF CURB.
  15. DETECTABLE WARNINGS TO BE PAID FOR UNDER SECTION 942 OF THE RI STANDARD SPECIFICATIONS
  16. 8" CONCRETE DEPTH FOR RADIUS WHEELCHAIR RAMPS ONLY. USE 4" DEPTH FOR TANGENT (MID-BLOCK) LOCATIONS.

**RHODE ISLAND DEPARTMENT OF TRANSPORTATION**

**WHEELCHAIR RAMP**

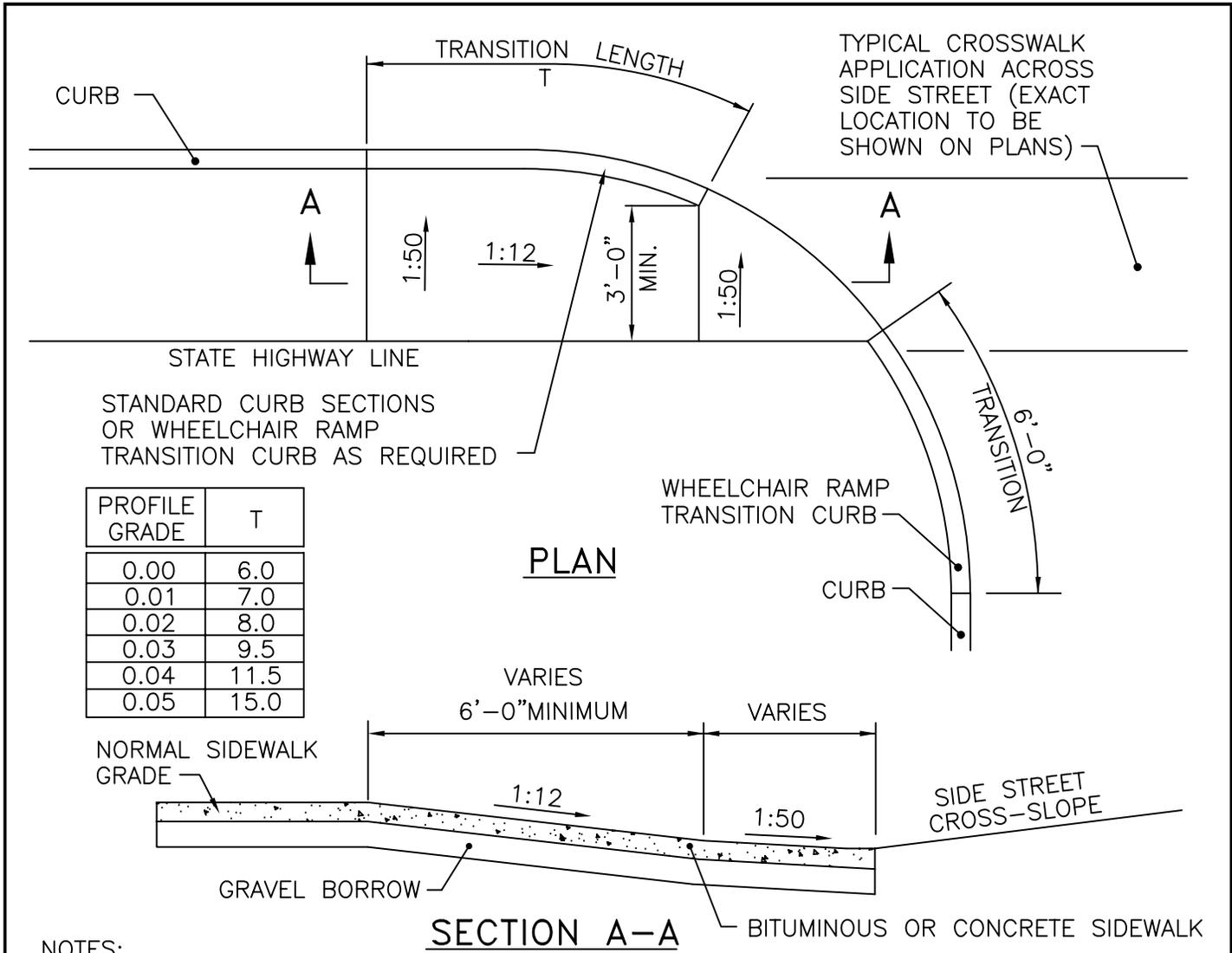
REVISIONS		
NO.	BY	DATE
1	MLP	Oct 05
2	MLP	6/27/08

*James P. Capaldi*  
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TRANSPORTATION

*Edmund J. Parker Jr.*  
CHIEF DESIGN ENGINEER  
TRANSPORTATION

JUNE 15, 1998  
ISSUE DATE





**NOTES:**

1. SHALL BE IN ACCORDANCE WITH SECTION 905 OF THE R.I. STANDARD SPECIFICATIONS.
2. THIS DETAIL IS TO BE USED ONLY WHEN STATE RIGHT-OF-WAY IS LIMITED TO BACK OF SIDEWALK, AND SIDEWALK IS NARROW WITH NO PEDESTRIAN TRAFFIC FROM SIDE STREET.
3. WHEN ANY OBSTRUCTION LOCATED IN THE SIDEWALK FALLS WITHIN A CROSSWALK AREA, IF POSSIBLE, THE OBSTRUCTION WILL BE PLACED SUCH THAT IT FALLS OUTSIDE OF THE RAMP.
4. AT NO TIME IS ANY PART OF THE WHEELCHAIR RAMP TO BE LOCATED OUTSIDE OF THE CROSSWALK, AND IT IS TO BE CENTERED WHENEVER POSSIBLE.
5. DRAINAGE FACILITIES ARE TO BE LOCATED UP-GRADE OF ALL WHEELCHAIR RAMPS.
6. LOCATION OF WHEELCHAIR RAMPS IS AS SHOWN ON CONTRACT DRAWINGS.
7. ALL REQUIRED CUTTING OF CURB PIECES TO BE PAID FOR UNDER COST OF CURB.
8. WHERE THE ROAD PROFILE EXCEEDS 5% THE TRANSITION LENGTH (T) SHALL BE EIGHTEEN FEET (18'-0").
9. THE ENTRANCE OF THE WHEELCHAIR RAMP SHALL BE FLUSH WITH THE ROADWAY.
10. MINIMUM LENGTH OF STRAIGHT OR CIRCULAR FILLER PIECES TO BE 3'-0" (GREATER LENGTHS PREFERRED).
11. AN UNOBSTRUCTED PATH OF TRAVEL WITH A MINIMUM WIDTH OF 3'-0" SHALL BE MAINTAINED.

**RHODE ISLAND DEPARTMENT OF TRANSPORTATION**

**WHEELCHAIR RAMP  
FOR LIMITED RIGHT-OF-WAY AREAS**

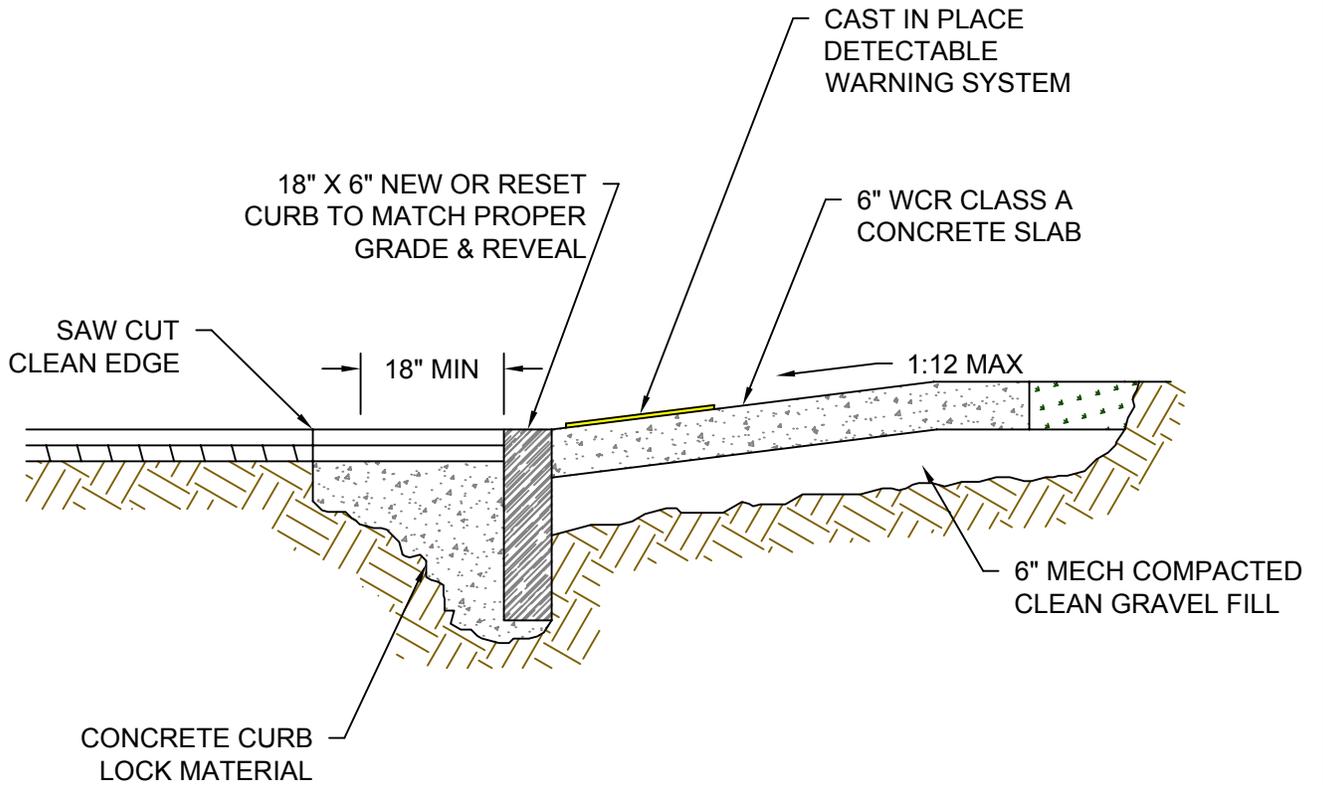
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TRANSPORTATION

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**WCR SIDEWALK A-A**



**CITY OF NEWPORT**  
 DEPARTMENT OF PUBLIC  
 SERVICES

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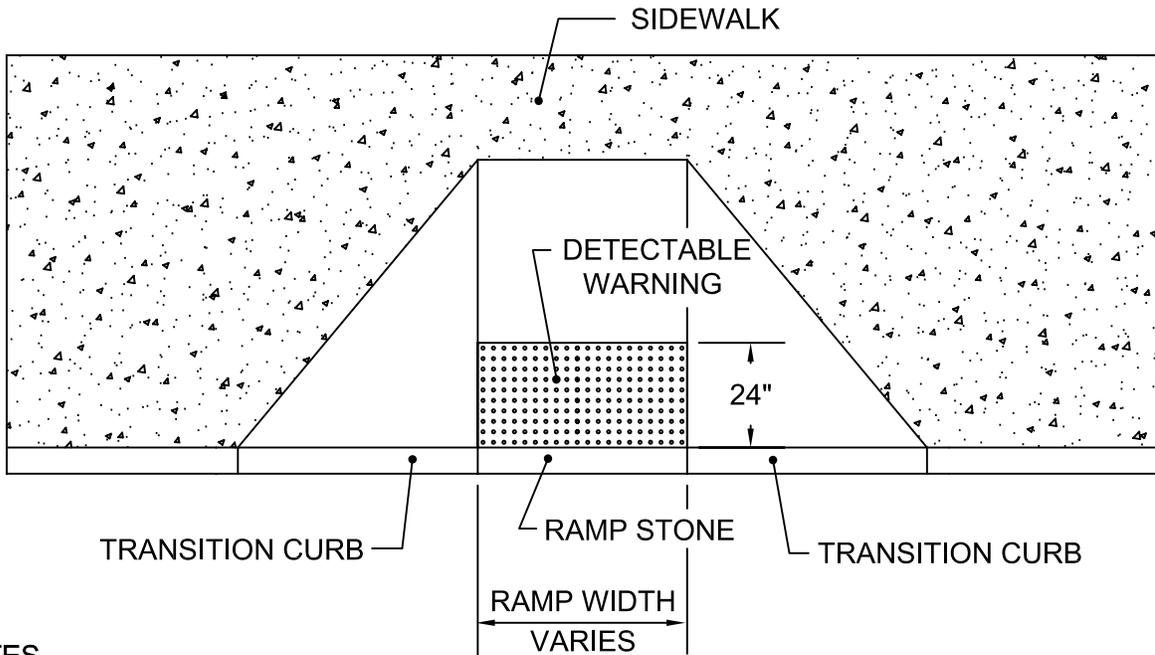
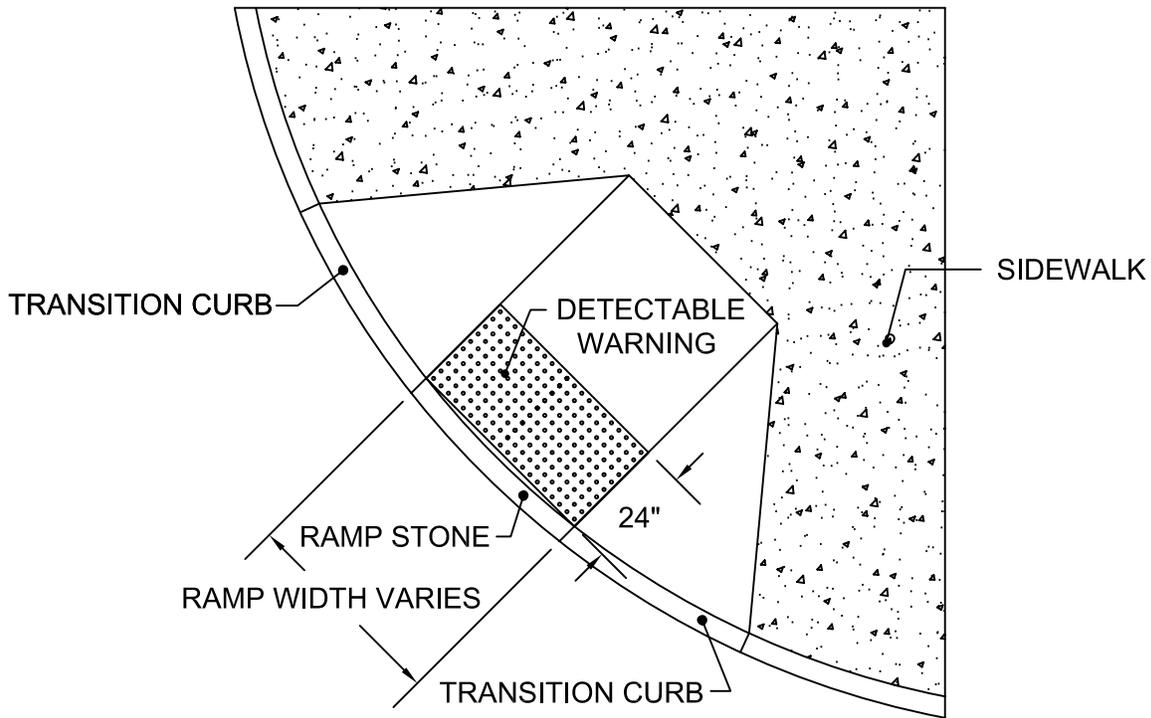
CITY SPECIFICATIONS

CONCRETE WCR SIDEWALK DETAIL

REVISION DATE:  
 MARCH 2011

SCALE  
 1"=2'

FIGURE  
 3.02



**NOTES**

1. DETECTABLE WARNING SYSTEM SHALL BE IN ACCORDANCE WITH SECTION 942 OF THE RI STANDARD SPECIFICATIONS

**RHODE ISLAND DEPARTMENT OF TRANSPORTATION**

REVISIONS

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1	MLP	March 05

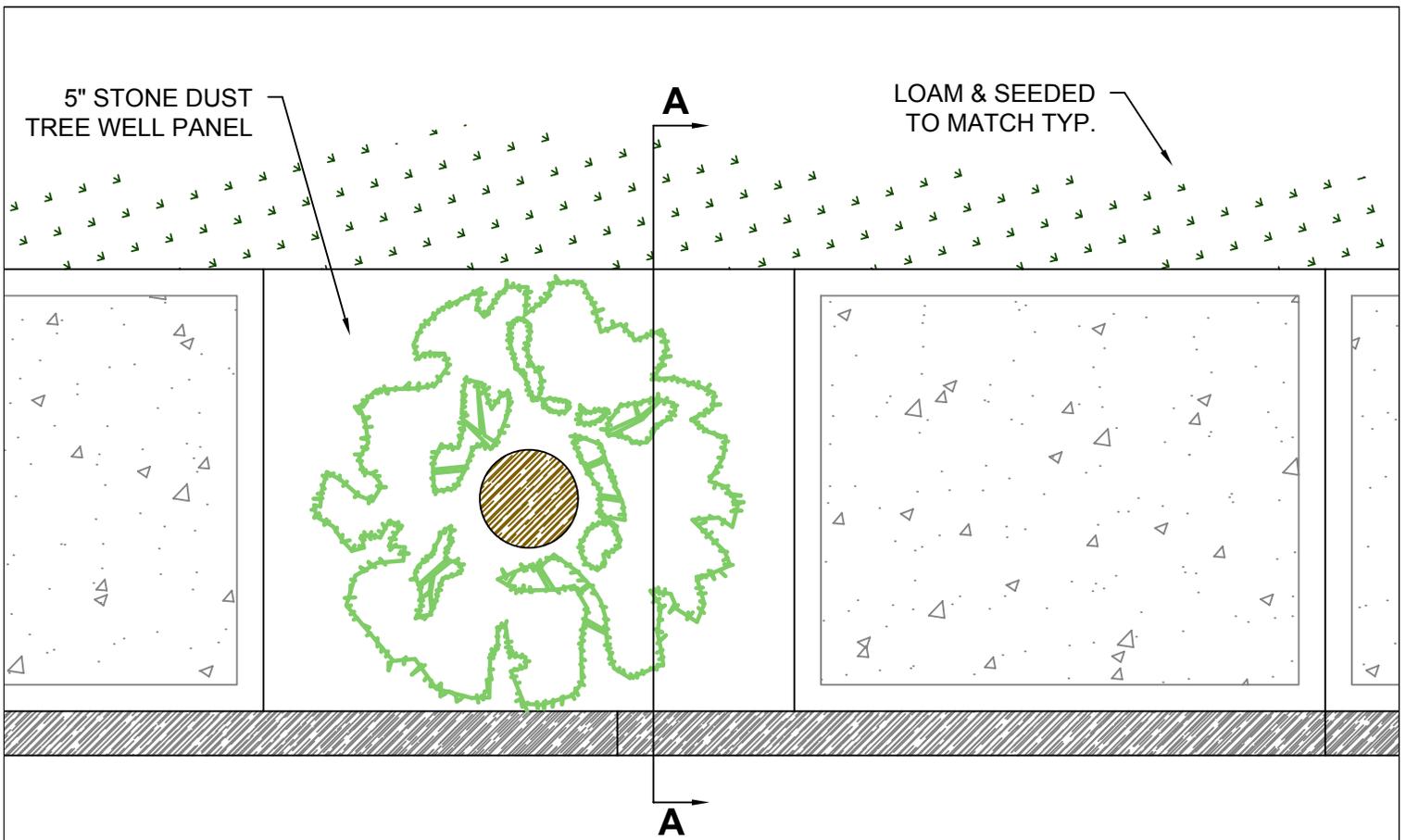
**DETECTABLE WARNING SYSTEM**

*James H. Casella*  
 CHIEF ENGINEER  
 TRANSPORTATION

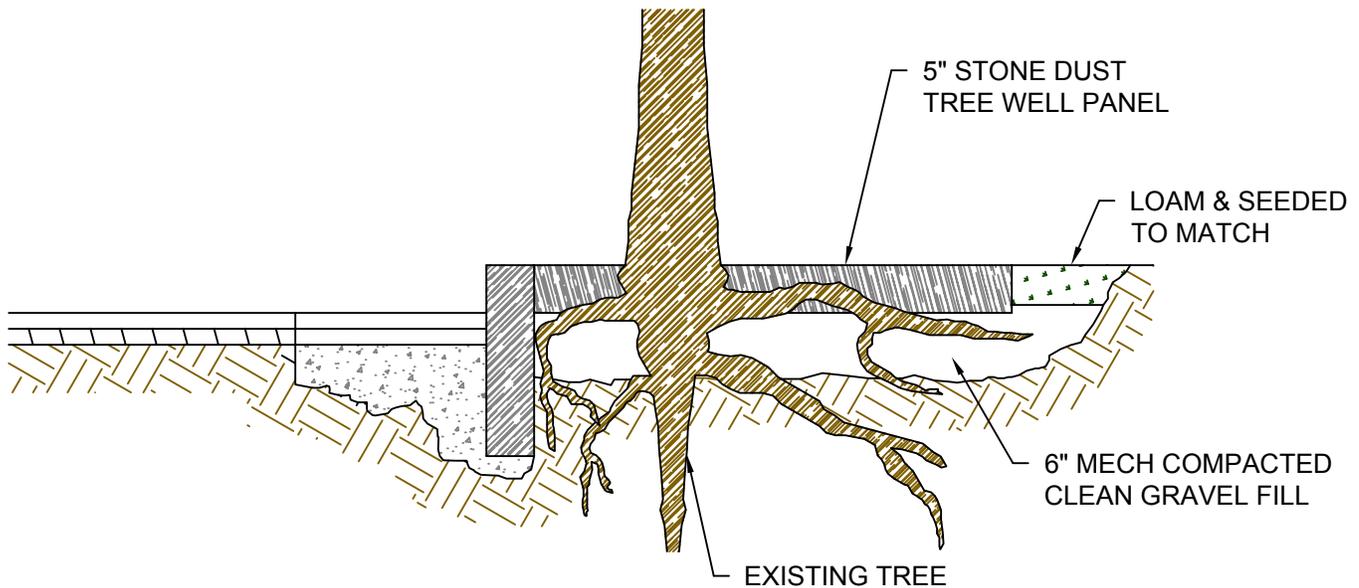
*Edward J. Pichler*  
 CHIEF DESIGN ENGINEER  
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**JUNE 15, 1998**  
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## STREET TREE SIDEWALK PLAN



## STREET TREE SIDEWALK A-A



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DEPARTMENT OF PUBLIC  
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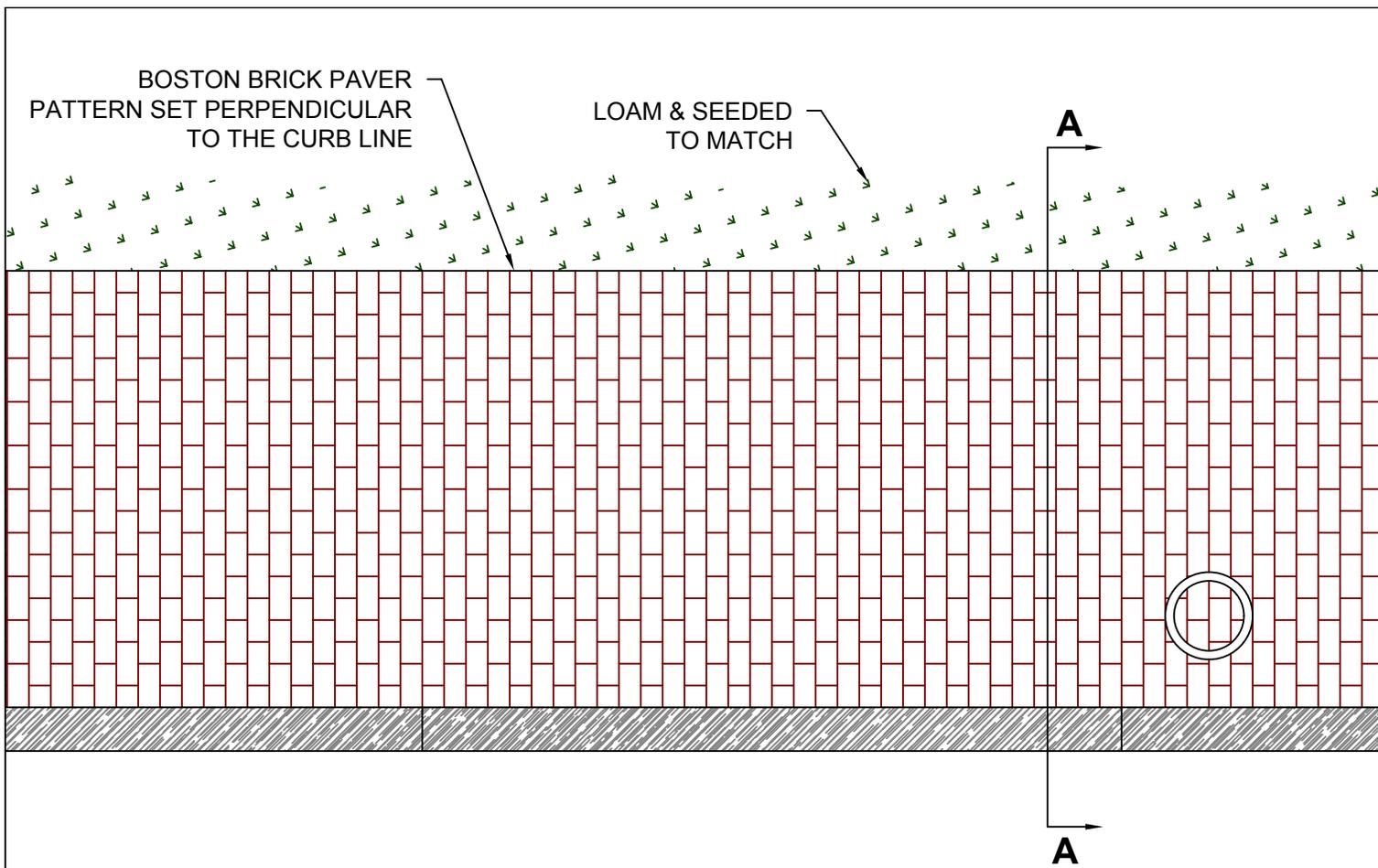
CITY SPECIFICATIONS

STREET TREE SIDEWALK DETAIL

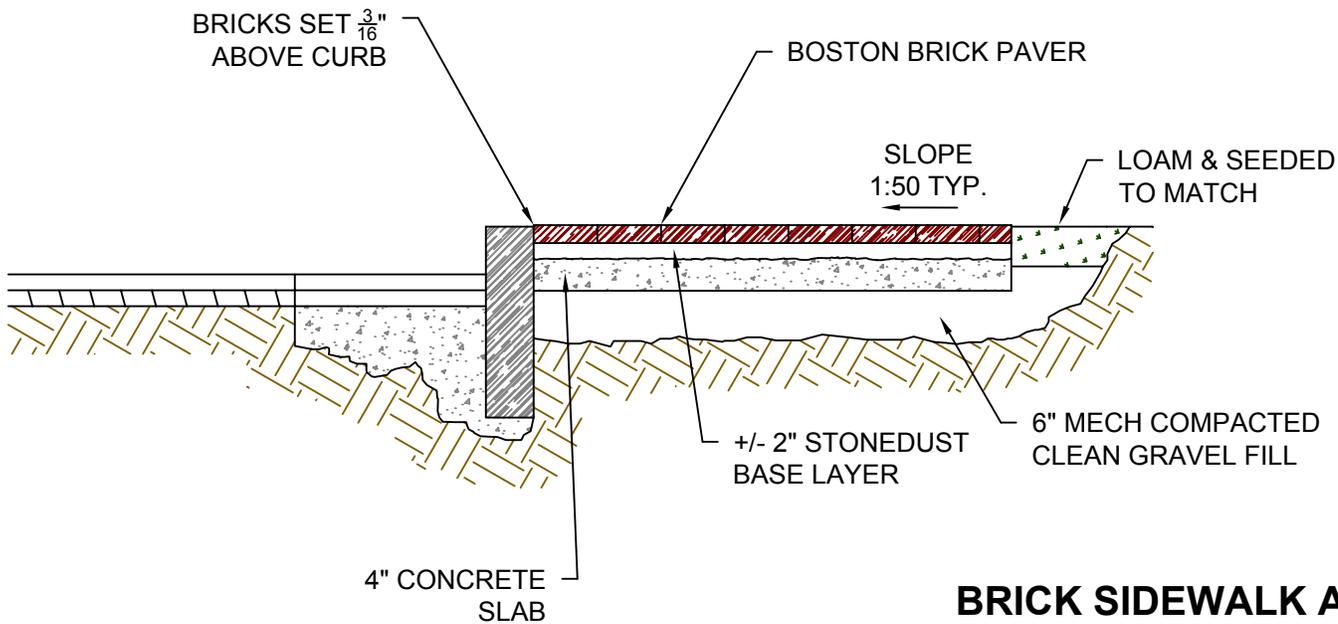
REVISION DATE:  
MARCH 2011

SCALE  
1"=2'

FIGURE  
4.01



**BRICK SIDEWALK PLAN**



**BRICK SIDEWALK A-A**



**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES

DRAWN BY FJM

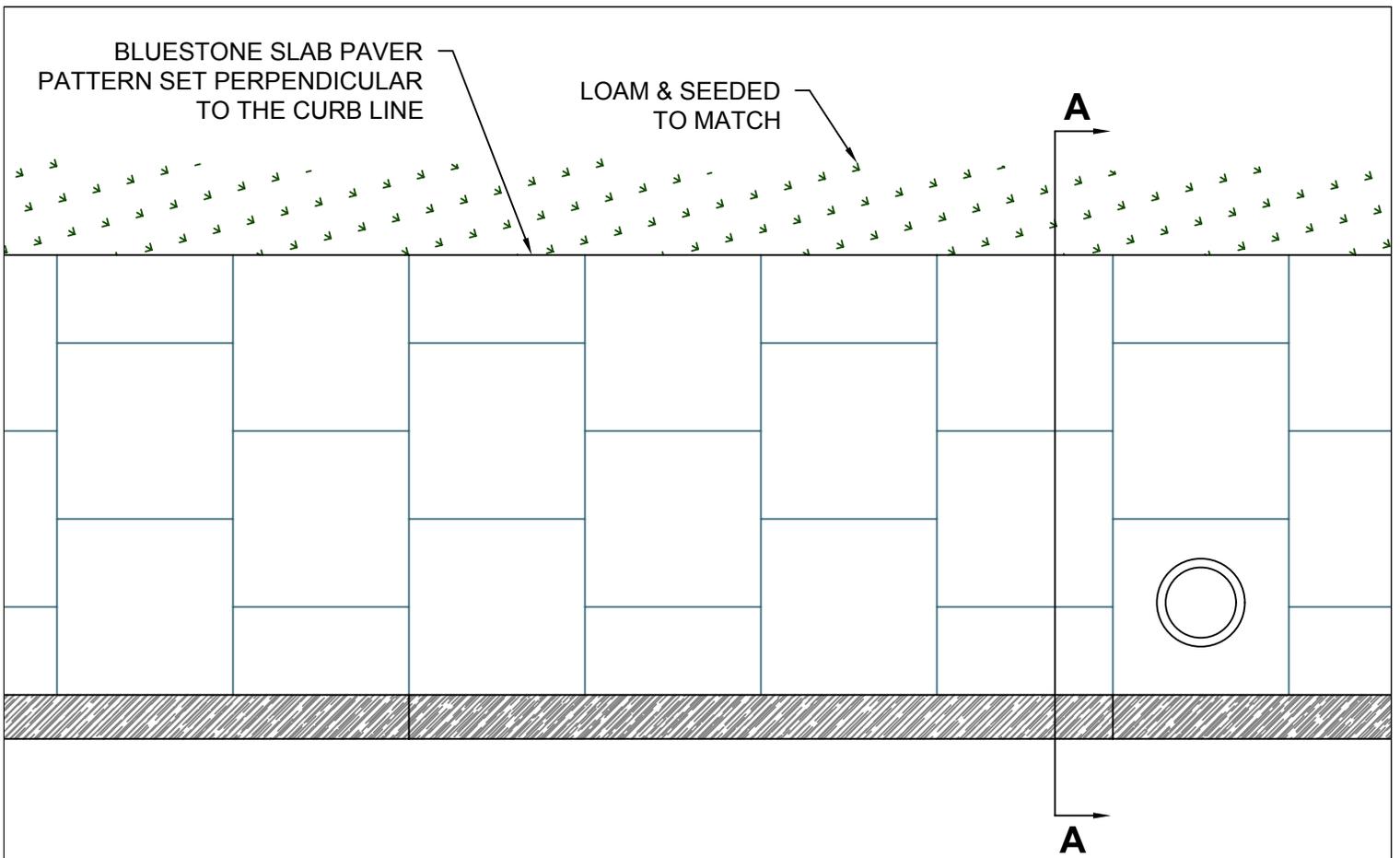
CITY SPECIFICATIONS

BRICK SIDEWALK DETAIL

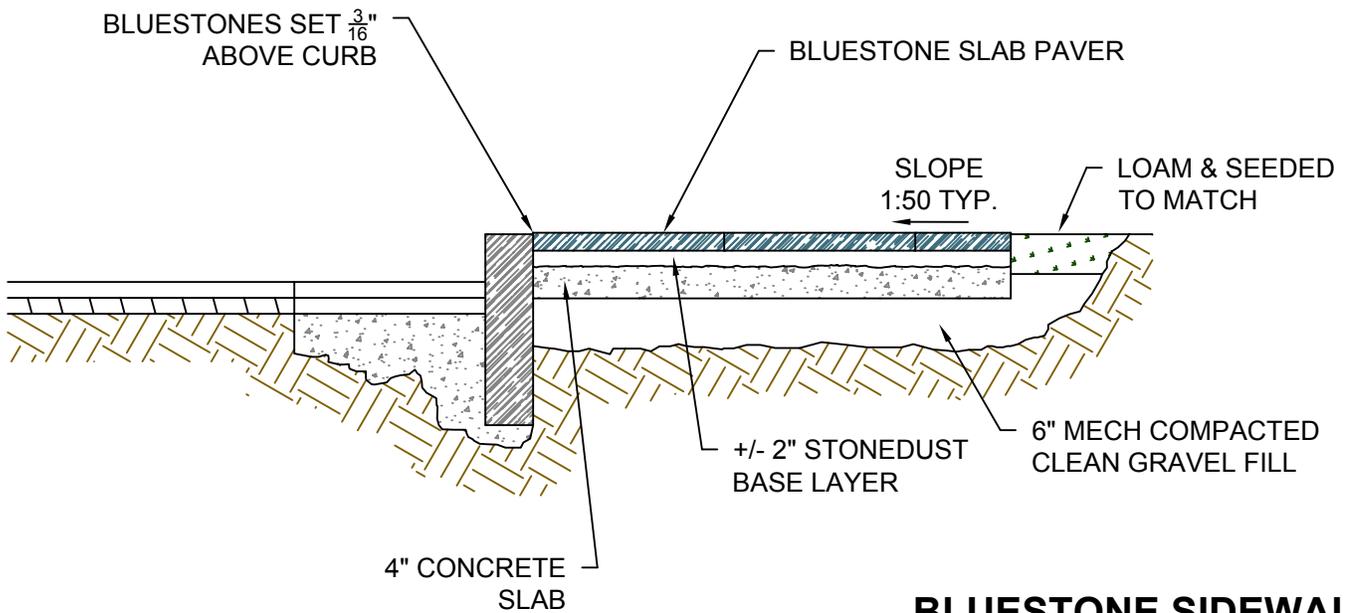
REVISION DATE:  
MARCH 2011

SCALE  
1"=2'

FIGURE  
5.01



**BLUESTONE SIDEWALK PLAN**



**BLUESTONE SIDEWALK A-A**



**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES

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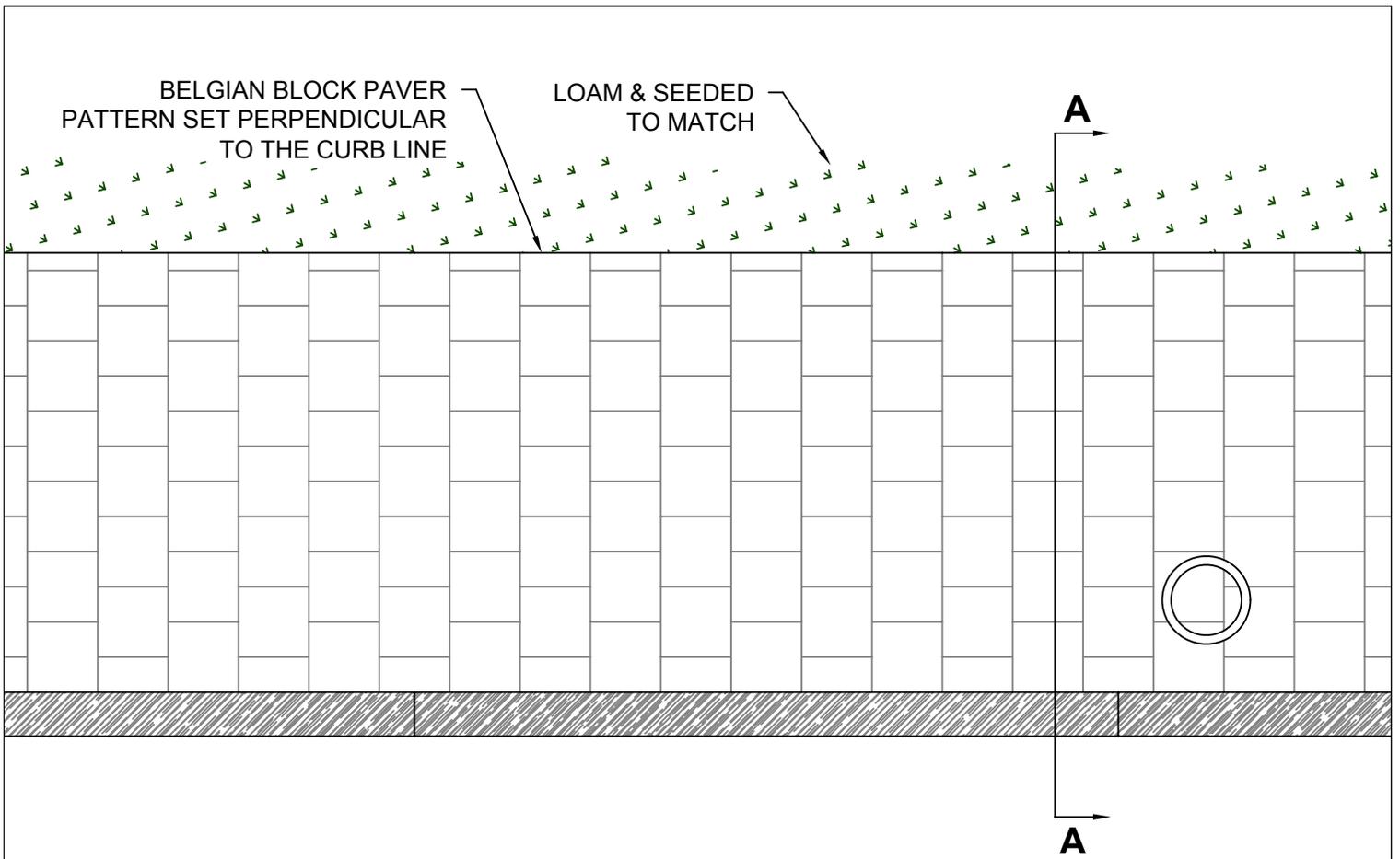
CITY SPECIFICATIONS

BLUESTONE SLAB SIDEWALK DETAIL

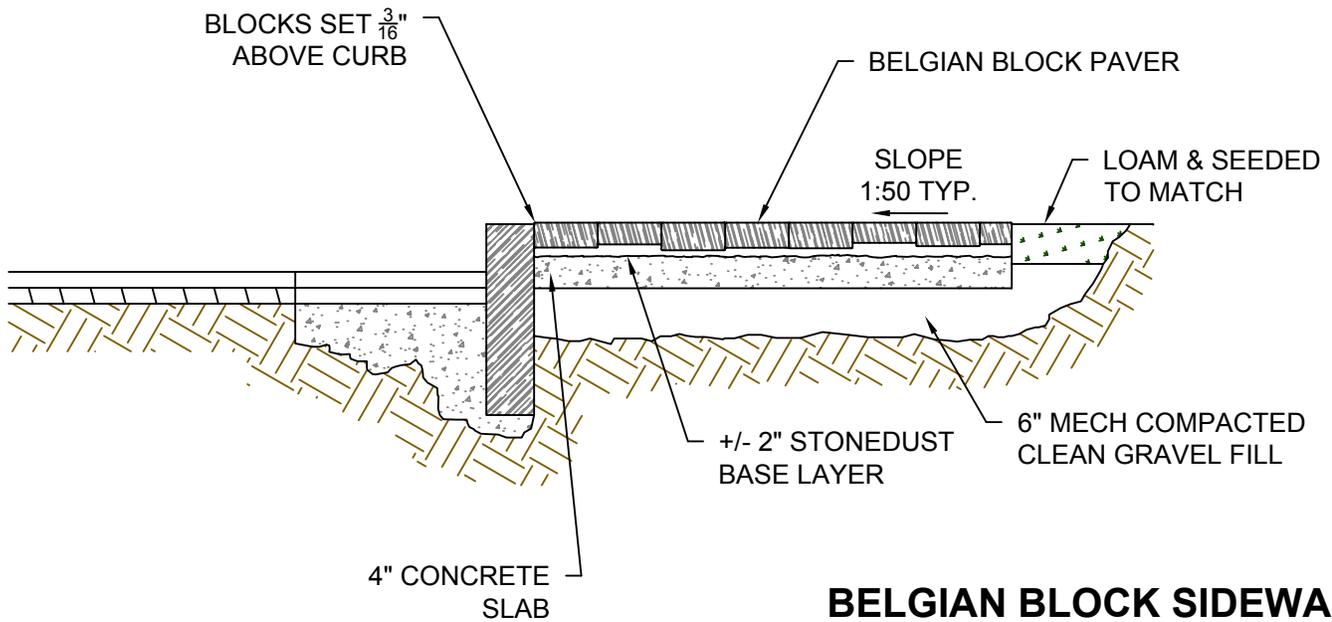
REVISION DATE:  
MARCH 2011

SCALE  
1"=2'

FIGURE  
5.02



**BELGIAN BLOCK SIDEWALK PLAN**



**BELGIAN BLOCK SIDEWALK A-A**



**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES

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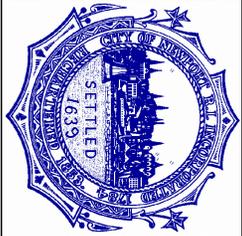
CITY SPECIFICATIONS

BELGIAN BLOCK SIDEWALK DETAIL

REVISION DATE:  
MARCH 2011

SCALE  
1"=2'

FIGURE  
5.03



**CITY OF NEWPORT**  
**DEPARTMENT OF PUBLIC SERVICES**

DRAWN BY FJM

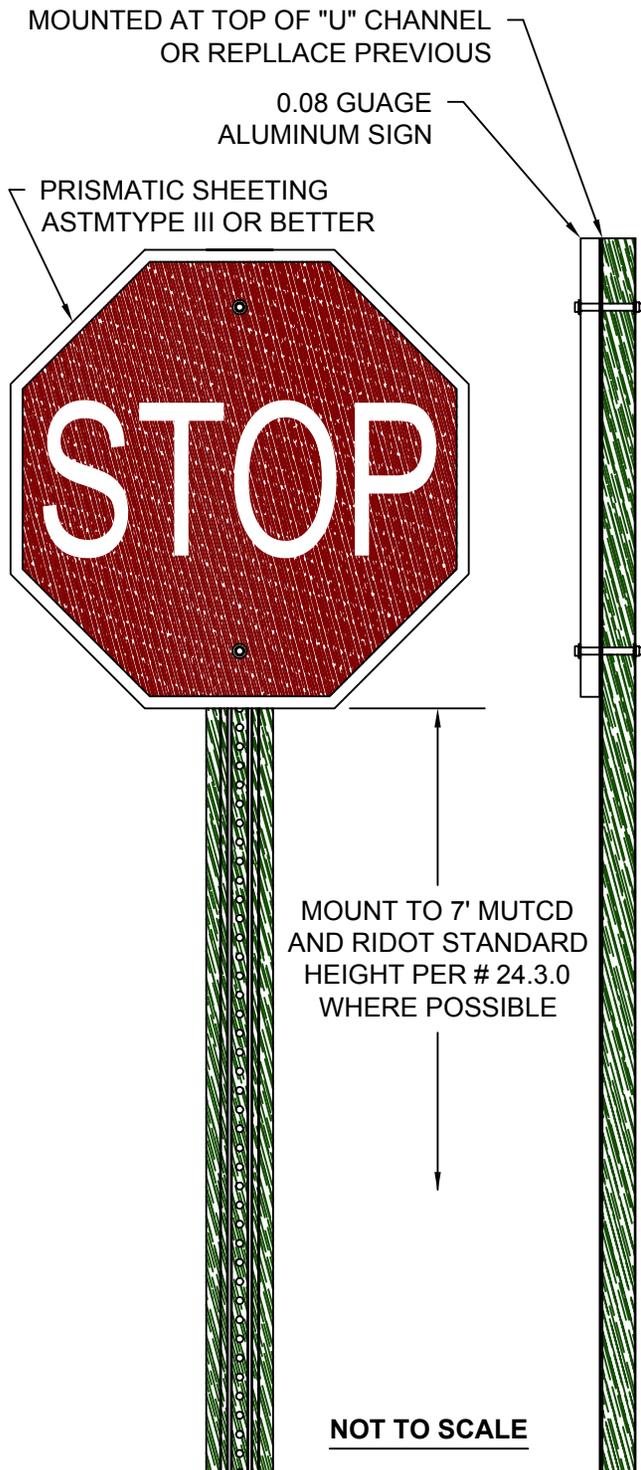
REVISION DATE:  
DEC 2010

SCALE  
AS NOTED

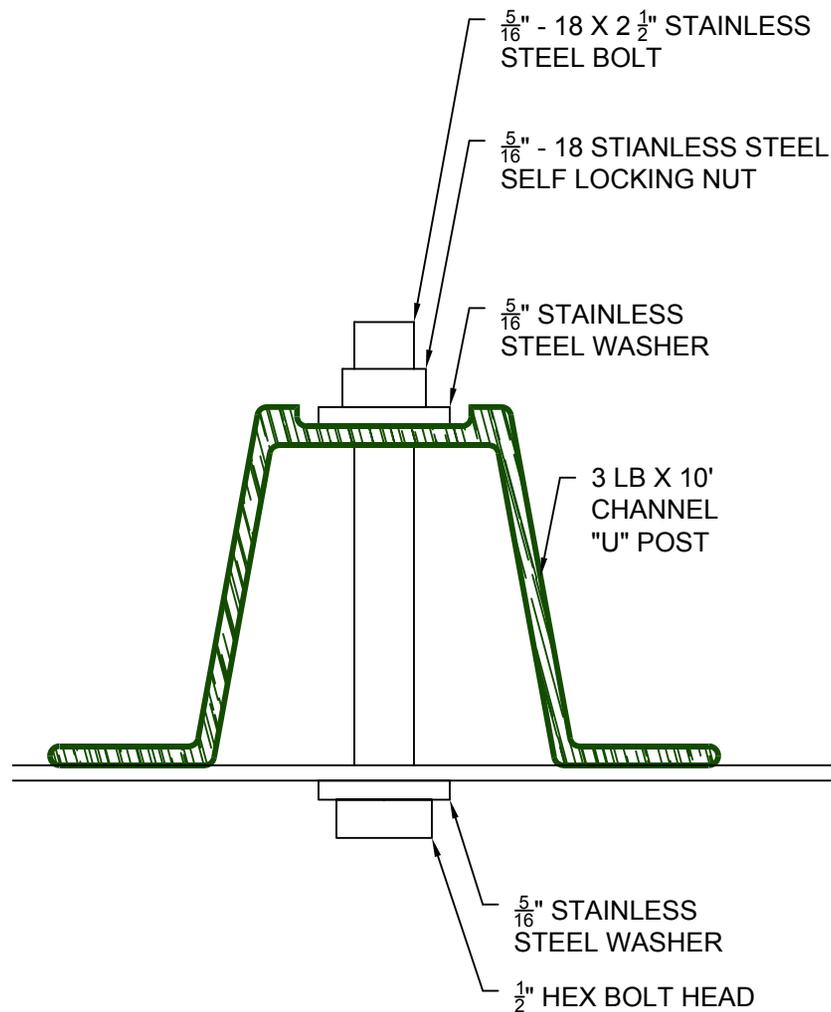
FIGURE  
6.01

**SIGN MOUNT DETAIL**

**CITY SPECIFICATIONS**

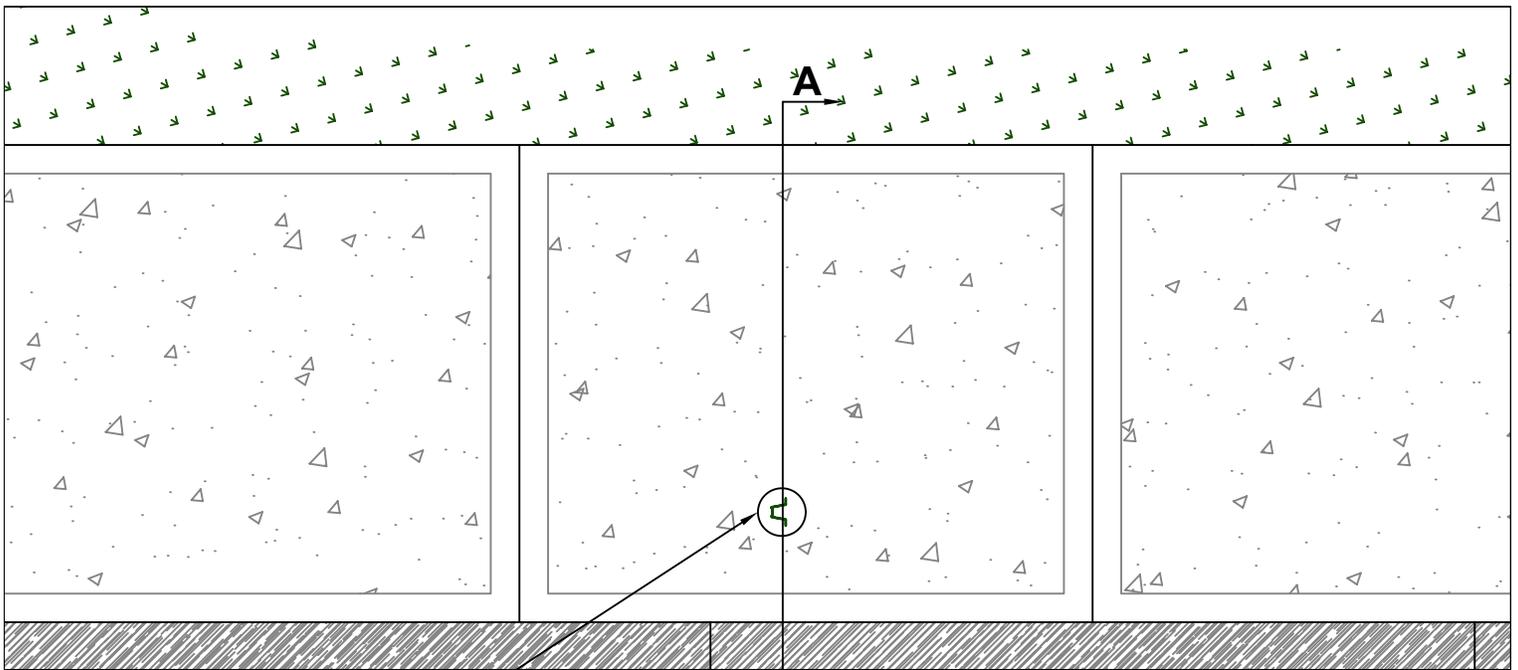


**NOT TO SCALE**



NOTE: ALL STAINLESS STEEL BOLTS AND HARDWARE TO BE GRADE 4 OR BETTER

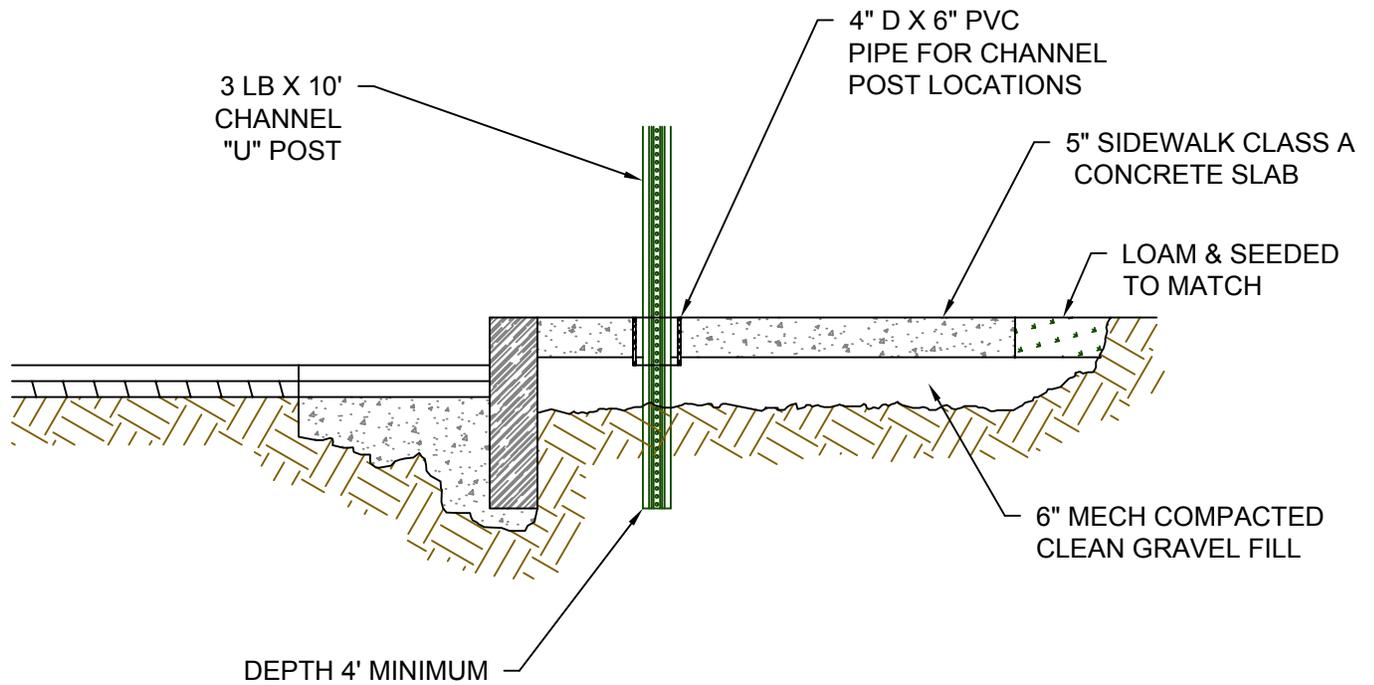
**SCALE 1"=1"**



4" D X 6" PVC  
PIPE FOR CHANNEL  
POST LOCATIONS

A

### CONCRETE SIDEWALK WITH SIGN



### SIDEWALK SIGN A-A



**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES

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CITY SPECIFICATIONS

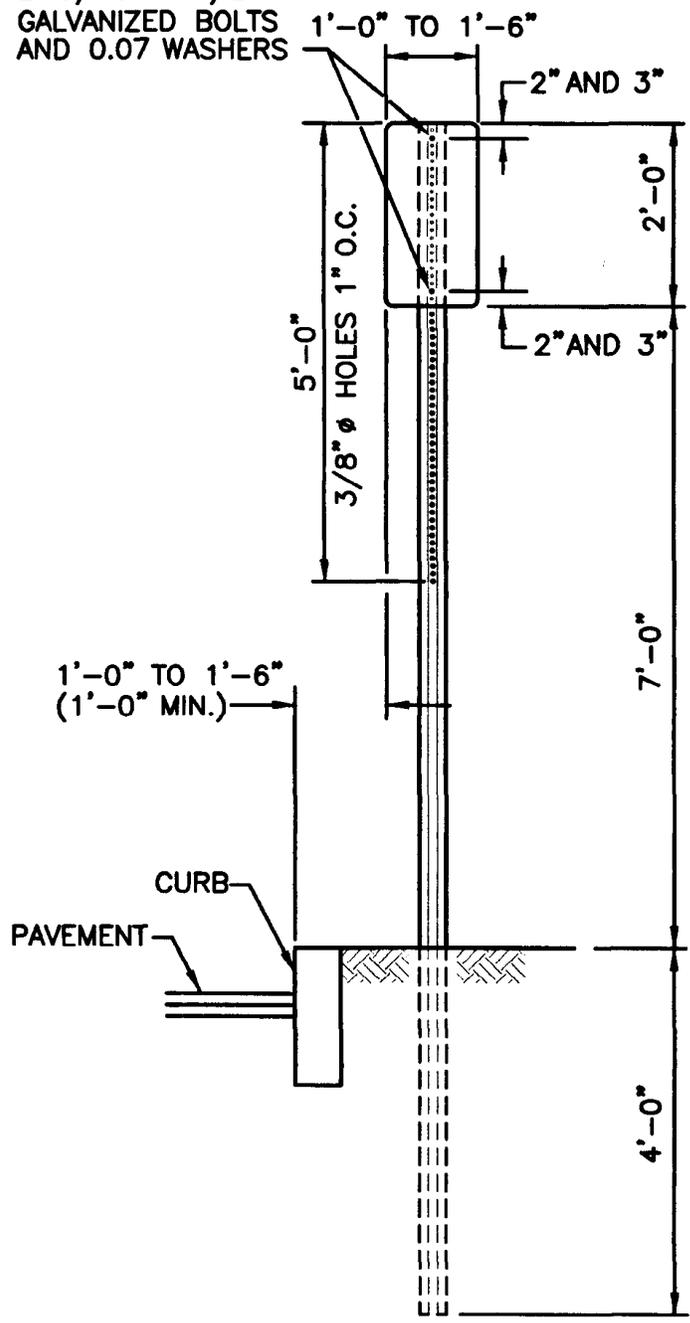
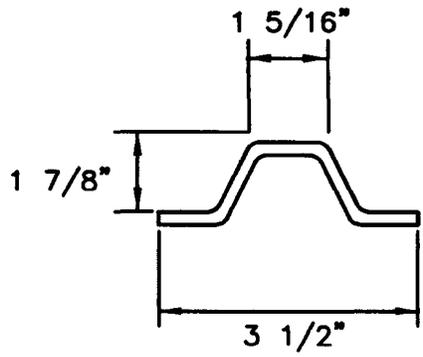
CONCRETE SIDEWALK WITH SIGN DETAIL

REVISION DATE:  
MARCH 2011

SCALE  
1"=2'

FIGURE  
6.02

2-5/16"x2 1/2"  
GALVANIZED BOLTS  
AND 0.07 WASHERS



- NOTES:**
1. SHALL BE IN ACCORDANCE WITH SECTION T.15 OF THE STANDARD SPECIFICATIONS.
  2. PARKING SIGNS SHALL BE SET AT AN ANGLE OF NOT LESS THAN 30° NOR MORE THAN 45° WITH A LINE PARALLEL TO FLOW OF TRAFFIC, 1'-6" (1'-0" MIN.) FROM EDGE OF CURB FACE.

RHODE ISLAND DEPARTMENT OF TRANSPORTATION

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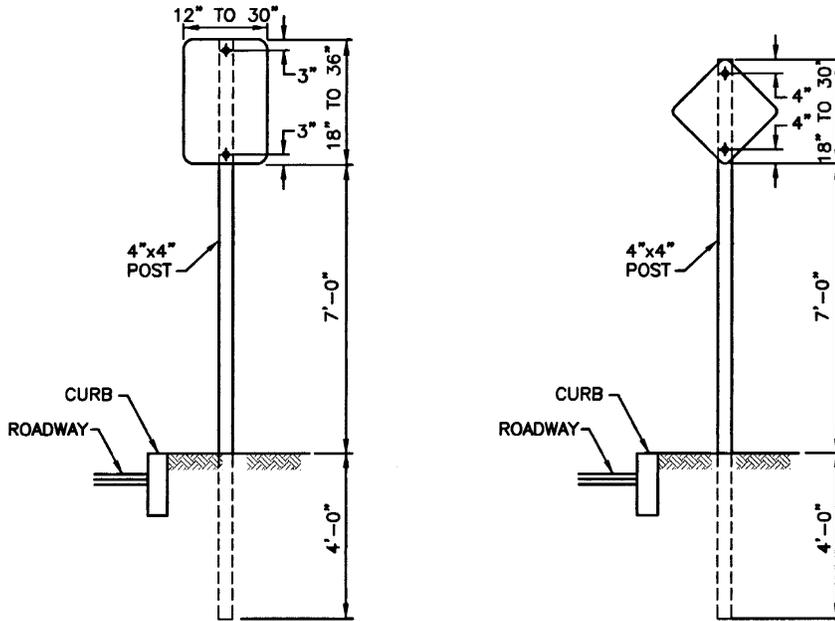
PARKING SIGN MOUNTING DETAIL

*James A. Capaldi*  
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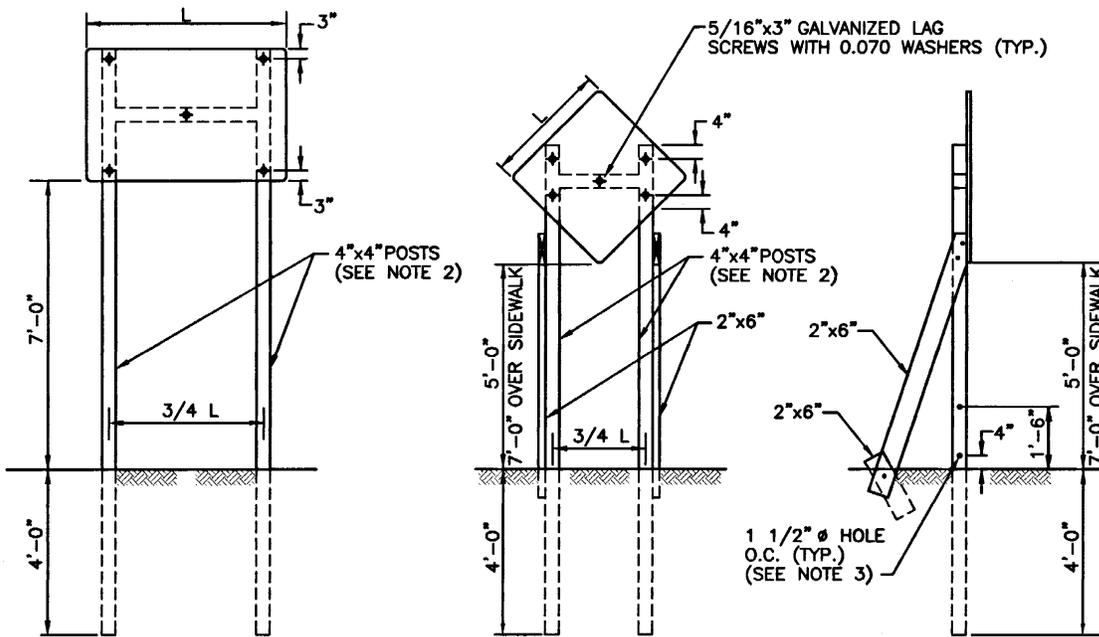
*Edmund J. Parker Jr.*  
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JUNE 15, 1998  
ISSUE DATE





SIGNS UP TO 10 SQ. FT.



SIGNS UP TO 60 SQ. FT.

NOTES:

1. SHALL BE IN ACCORDANCE WITH SECTION T.15 OF THE R.I. STANDARD SPECIFICATIONS.
2. USE (2) 4"x6" POSTS FOR SIGN AREAS GREATER THAN 20 SQ. FT.
3. DRILL 1 1/2" Ø HOLES FOR 4"x6" POSTS ONLY.
4. FOR SIGNS 5'-0"x5'-0" AND LARGER USE DIAGONAL BRACING ON EACH VERTICAL POST AND 4 LAG SCREWS
5. CONSTRUCTION AND TEMPORARY SIGN PANELS SHALL BE 3/4" THICK EXTERIOR GRADE PLYWOOD OR ALUMINUM.
6. ALL SIGN SUPPORTS (INCLUDING TEMPORARY) MUST BE SUCCESSFULLY CRASH TESTED.
7. FOR SIGNS GREATER THAN 60 SQ. FT., REFER TO STD. 30.1.0, 30.1.1, 30.2.0, 30.2.1, 30.3.0, 30.3.1, 30.4.0, 30.4.1, 30.4.2 AND 30.4.3.

RHODE ISLAND DEPARTMENT OF TRANSPORTATION

CONSTRUCTION AND TEMPORARY  
SIGN MOUNTINGS (SIGNS UP TO 60 SQ. FT.)

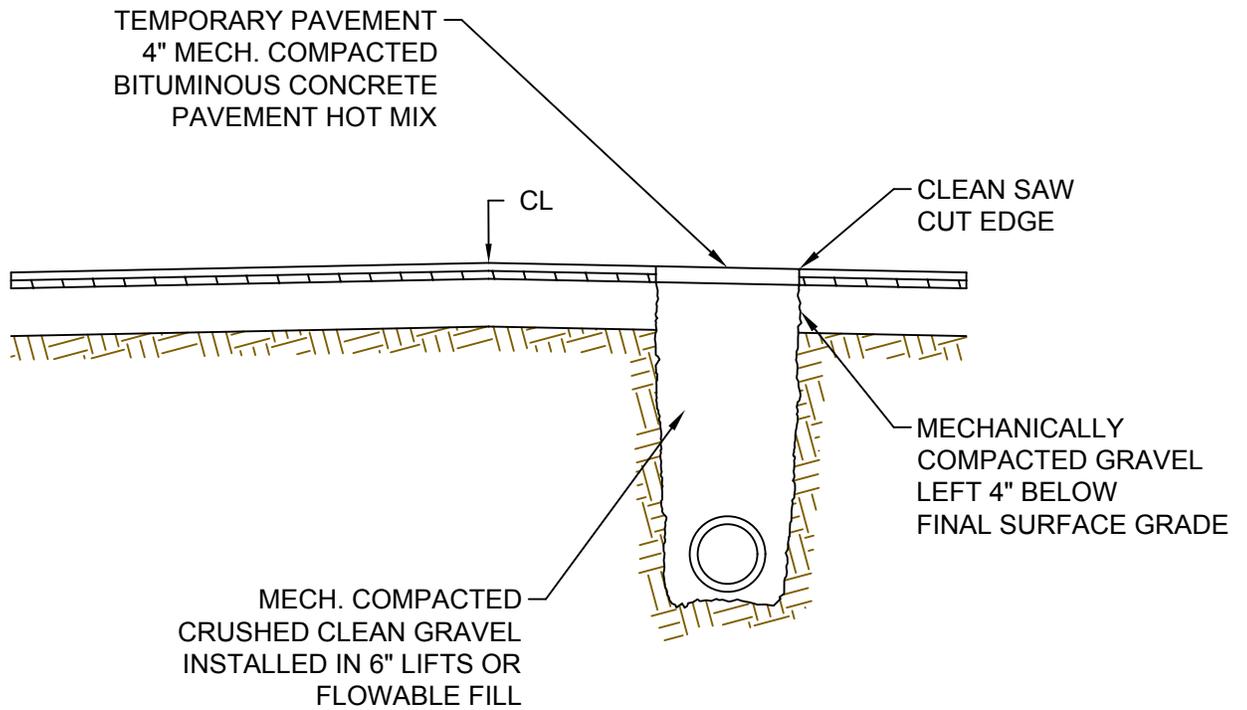
REVISIONS		
NO.	BY	DATE

*James A. Gagliardi*  
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TRANSPORTATION

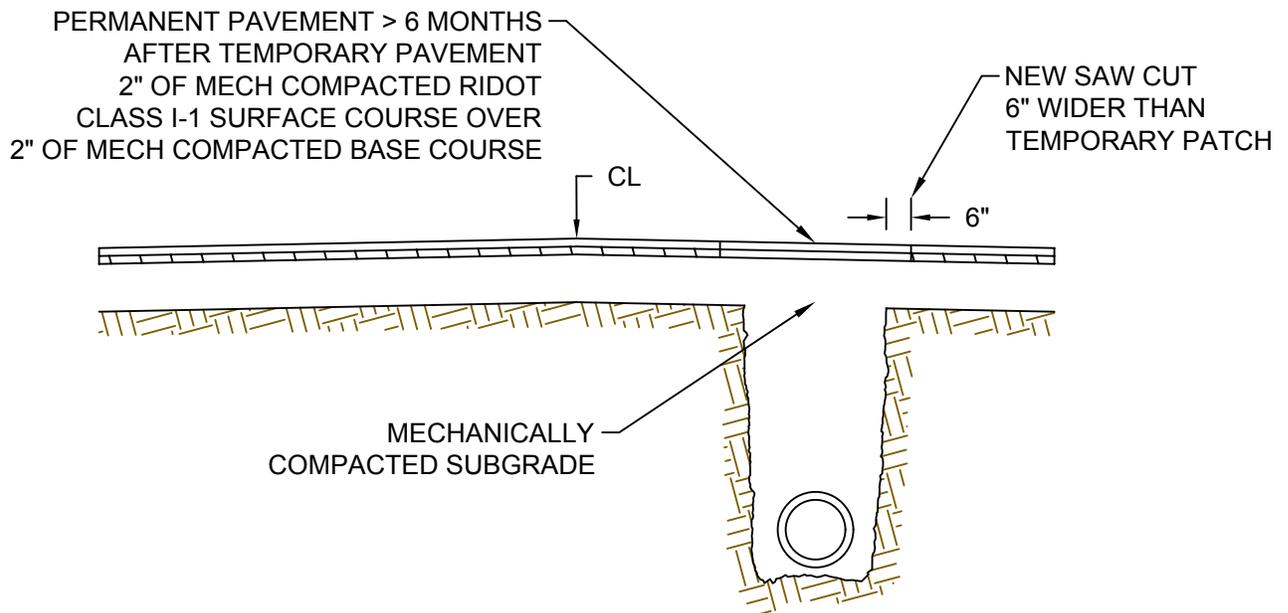
*Edward J. Berke*  
CHIEF DESIGN ENGINEER  
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### TEMPORARY RESTORATION



### PERMANENT RESTORATION



**CITY OF NEWPORT**  
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SERVICES

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CITY SPECIFICATIONS

UTILITY TRENCH RESTORATION DETAIL

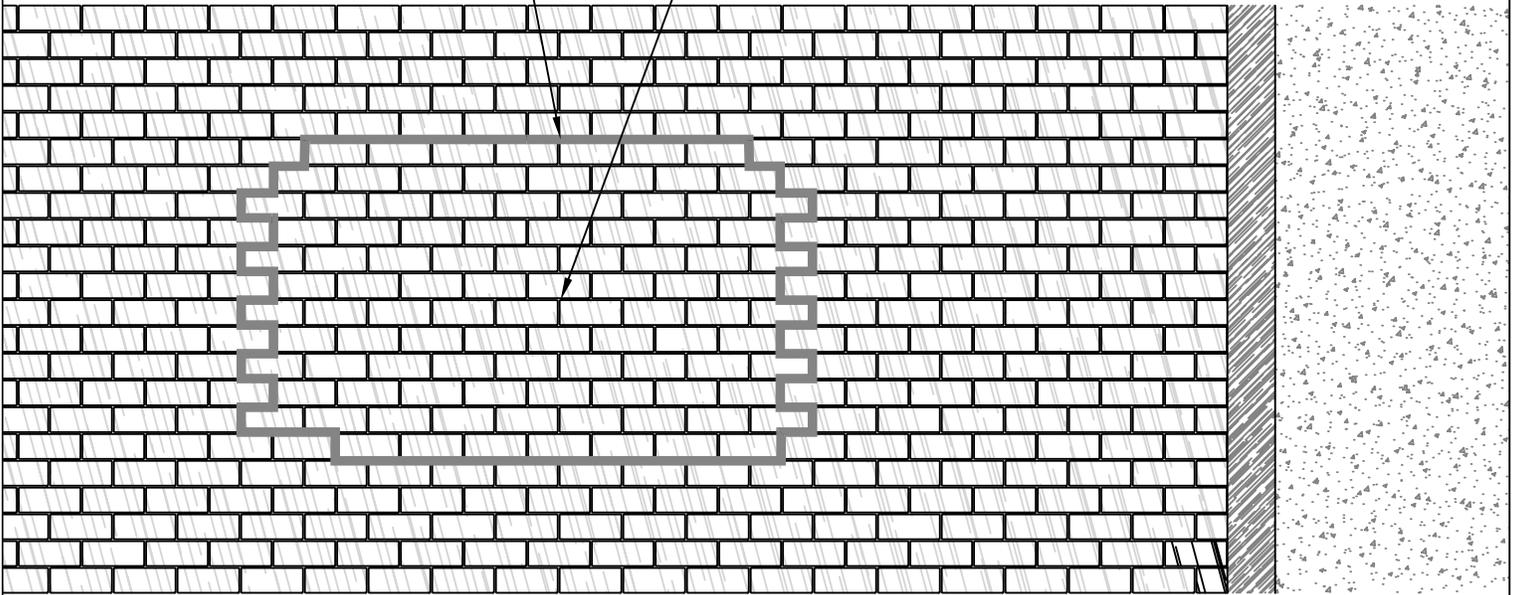
REVISION DATE:  
MARCH 2011

SCALE  
1"=4'

FIGURE  
7.01

REMOVE AND RESET BELGIAN  
BLOCKS TO MATCH EXISTING  
BLOCK PATTERN PERPENDICULAR  
TO CURB LINE

MORTAR JOINTS SHALL BE CAREFULLY  
POINTED USING 1 PART PORTLAND CEMENT  
TO 1.5 PARTS SAND BY VOLUME

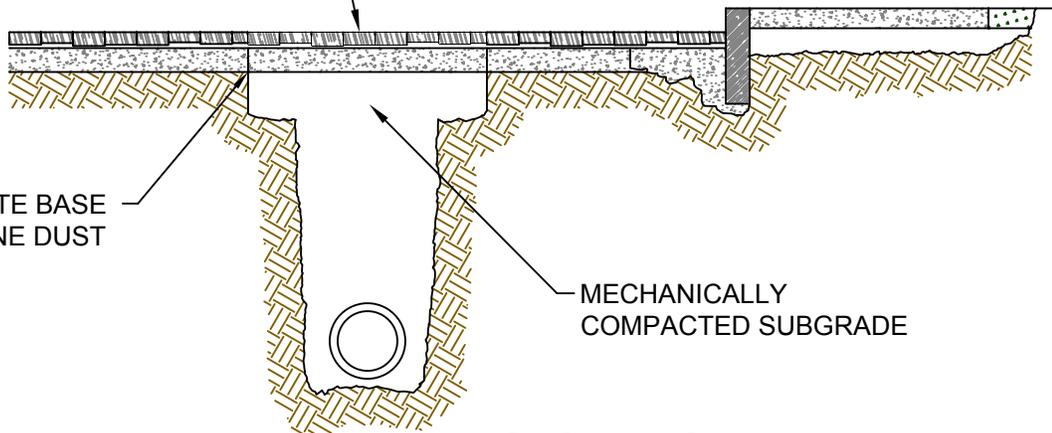


NOTE: PROTECT RESET BLOCK FROM TRAFFIC FOR 72 HOURS

**SCALE 1:2**

PERMANENT PAVEMENT > 6 MONTHS  
AFTER TEMPORARY PAVEMENT  
2" OF MECH COMPACTED RIDOT  
CLASS I-1 SURFACE COURSE OVER  
2" OF MECH COMPACTED BASE COURSE

6" CONCRETE BASE  
UNDER +/- 2" STONE DUST



MECHANICALLY  
COMPACTED SUBGRADE

**PERMANENT RESTORATION**

**SCALE 1:4**



**CITY OF NEWPORT**  
DEPARTMENT OF PUBLIC  
SERVICES

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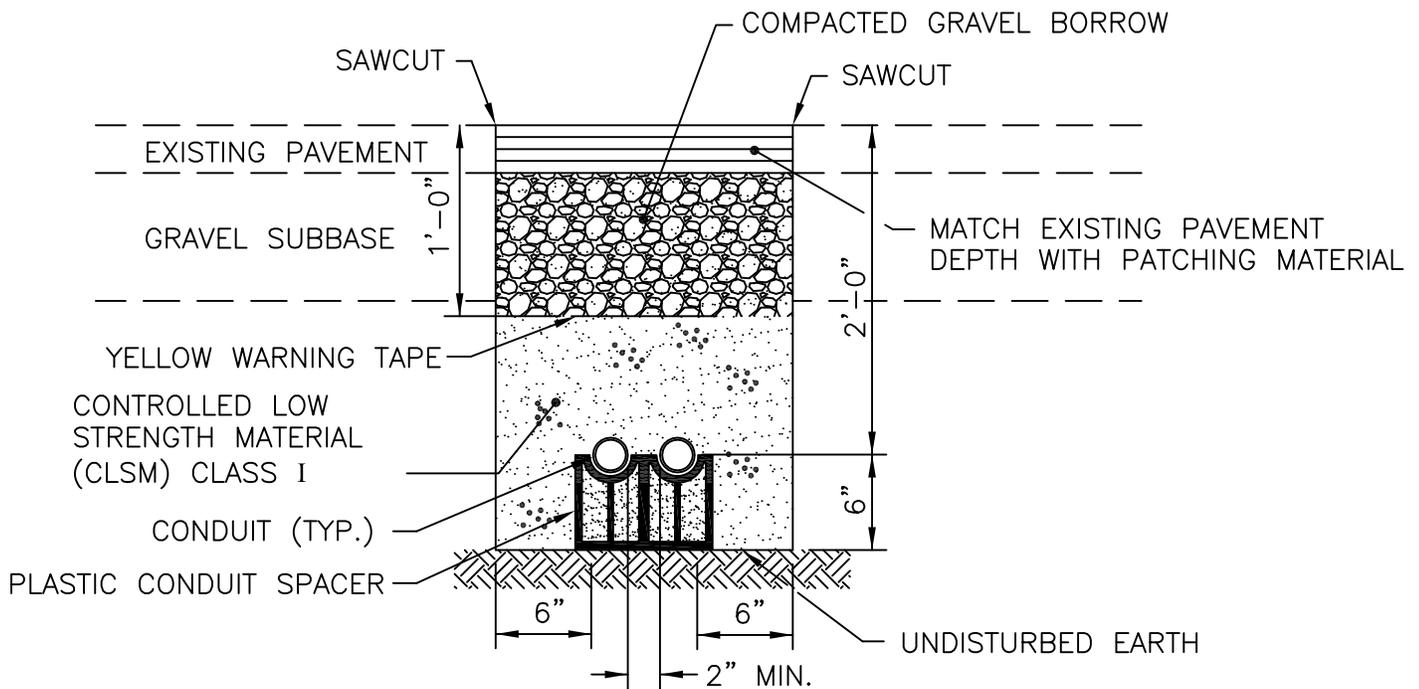
CITY SPECIFICATIONS

BELGIAN BLOCK TRENCH RESTORATION DETAIL

REVISION DATE:  
MARCH 2011

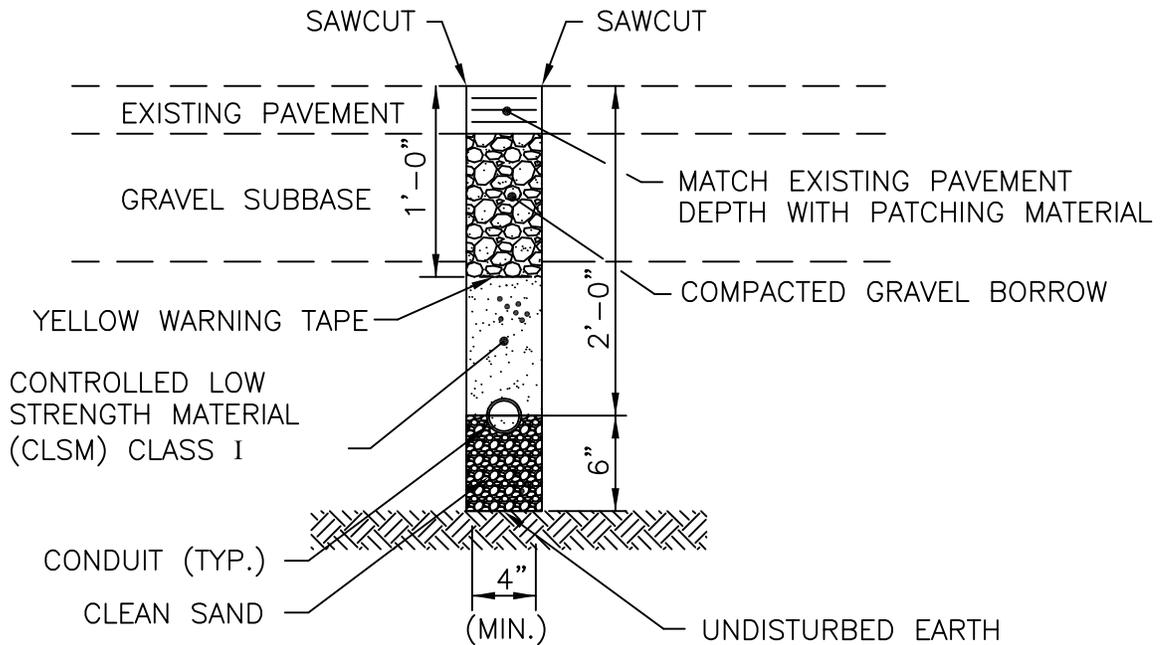
SCALE  
1"=4'

FIGURE  
7.02



**NOTE:**  
INSTALL SPACERS AT APPROXIMATELY 6' APART.

### STANDARD TRENCH DETAIL



### AUTOMATIC TRENCHING MACHINE DETAIL

**NOTE:**  
SHALL BE IN ACCORDANCE WITH SECTION T.06 OF THE RI STANDARD SPECIFICATIONS.

## RHODE ISLAND DEPARTMENT OF TRANSPORTATION

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### TRENCH DETAIL FOR CONDUIT IN EXISTING ROADWAY

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JUNE 15, 1998  
ISSUE DATE

