

Canton, Ohio

**CANTON CITY
ENGINEERING DEPARTMENT**

**Construction
Contract and Specifications**

===== **FOR** =====

**TRINITY PLACE & CAPRICE AVENUE NW
SANITARY MANHOLE REHABILITATION**

GENERAL PROJECT 1174

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LEGAL NOTICE

The Director of Public Service of the City of Canton, Ohio will accept sealed bids at the City's Contract Office until 2:00 p.m. **September 24, 2013** for the

Trinity Place & Caprice Avenue NW Sanitary Manhole Rehabilitation, G.P. 1174

as according to specifications posted at <http://cantonohio.gov/engineering/?pg=507>. The Contract Office is located at 218 Cleveland Ave. S.W., 6th Floor, City Hall Building, Canton, OH 44702. The Engineering Department at 2436 30th St. N.E. is holding the plans and specifications on file.

Please be advised that the City will hold the Bid Opening in the conference room located on the sixth floor of the City Hall building. The City will disqualify all bids not submitted on or before 2:00 p.m. on the day of the Bid Opening. All bids will be opened and publicly read immediately after the expiration of the time for filing such bids.

Project Labor Agreement (PLA) **will** be required for this project.

The estimated construction cost for this project is **\$130,000.00**

Each bidder must submit evidence of its experience on projects of similar size and complexity. The bidder must use the proposal blanks (Appendix G – Cost Proposal) provided in the bid package for submitting bids. The City will not accept any other submittals.

Each bid must contain the name of every person or company interested in the same. A certified check, cashier's check, or surety bond, in accordance with Section 153.54 of the Ohio Revised Code, must accompany the bid. The bond or check must be drawn on a solvent bank or bonding company licensed in the State of Ohio to provide said surety and satisfactory to the Director of Public Service as a guarantee that if the bid is accepted, a contract will be entered into and its performance properly secured.

Said certified check or cashier's check shall be for ten percent (10%) of the total amount bid. Where a bid bond is used, it shall be in an amount of one hundred percent (100%) of the total amount of the bid.

The City of Canton will only accept original checks and bid bonds. Therefore, if any company and/or bidder(s) submit a copy (including faxed copies) of his/her security, the City will disqualify the bid.

Bond, Certified Check or Cashier's Check shall be returned upon the proper execution and securing of the contract.

The Director of Public Service reserves the right to waive any technical defects in any bid

bond submitted so long as the bond is in substantial compliance with State Law.

The Party awarded contract should be prepared to furnish surety bond for faithful performance. All bids must be firm bids. The City will not consider bids containing an escalator clause.

Bidders must obtain specifications, and proposal blanks to be eligible as a responsive bidder. Potential bidders may obtain specifications and proposal blanks at the <http://cantonohio.gov/engineering/?pg=507>. It is the bidders' responsibility to secure the correct documents needed to bid.

All contractors and subcontractors involved with the project will, to the extent practicable use Ohio products, materials, services, and labor in the implementation of their project.

Bidders must comply with prevailing wage rates on Heavy and Highway construction projects for the State of Ohio as included in the contract documents.

The Board of Control reserves the right to reject any and/or all bids. The Board of Control will accept the bid(s) deemed most beneficial to the City of Canton.

It is now the City's policy that for IRS purposes, all companies must submit their Federal I.D. number.

Authorization is by order of William Bartos, Canton City Service Director.

Published in the Repository: September 9 and September 16, 2013

NOTICE TO CONTRACTOR

Please be advised that this contract is scheduled for completion 150 calendar days (Including the period from December 1, 2013 through April 1, 2014) after the, "Notice to Proceed" is issued by the City. The contractor must embrace and start the project within ten days form the receipt of the, "Notice to Proceed" unless otherwise authorized in writing by the city. The city has set liquidated damages at \$500 per day for all working days beyond those noted above.

Each bidder must submit an "affirmative action plan" and/or "EEO Policy." Bidder must read all EEO and MBE requirements. Please submit a request for waiver on company letterhead if you cannot meet the requirement. Enclose the company EEO policy. An EEO policy statement form is included if you do not have a formal policy.

THE CONTRACTOR MUST COMPLETE THE LETTER OF ACCENT FOR THE PROJECT LABOR AGREEMENT (PLA). The PLA is located in Appendix E of this book. The letter of accent is located in Appendix 1 of the PLA.

The Director of Public Service reserves the right to waive/accept any technical defects in the submission of documentation for this bid.

PLEASE ACKNOWLEDGE THAT YOU HAVE READ THE ABOVE REQUIREMENTS BY SIGNING BELOW.

DATE

SIGNATURE

Instruction to Bidders

The bidder must download the complete bid package as advertised, including any blank pages. You must submit the bid package for the bid. Double-sided prints are required. (Note: Single-sided printing will result with several pages printed blank. Be sure to select double-sided in the print settings of the printer.) Use a two-hole punch; punch the holes on the left side of the book. Submit the bid package with a removable cover. Use blue ink for all signatures.

Bidders must examine, before submitting their bids, the specifications and form of contract. There may be changes in the specifications from those previously used; the City presumes that a bidder has read and fully understands each clause embodied in this contract. Any information derived from the Engineer's office will not relieve the Contractor from any risks or from fulfilling all of the terms of this contract.

It is the bidders' responsibility to revisit this website for any updates or changes until date and time of the bid opening. Please, send email to steve.henderson@cantonohio.gov if you intend to bid the project. I will send any updates to you via email. However, it does not release you from checking the website for updates.

All written addenda issued by the Engineer will become part of the Contract Documents. All bidders shall be bound by such addenda, whether received or not received by the bidder (the addenda will be posted on the website). The City will not consider any oral or telephonic modifications of the Contract Documents.

The City reserves the right to reject bids or waive any informality or irregularity in any bid received. Failure to complete/submit all documentation may result in the bidder being determined as non-responsive. The Director shall make the final decision in this matter.

The City will permit the bidder to included additional or supplemental attachments. The bid must be sealed and addressed to the Service Director of the City of Canton, Contract Office – 6th Floor, 218 Cleveland Avenue S.W., P.O. Box 24218, Canton, Ohio 44701-4218, Attn: Randall Dublikar and write on the envelope, "Proposal for the Trinity Place and Caprice Avenue Sanitary Manhole Rehabilitation, G.P. 1174", and must be deposited with all papers bound.

Place bid bond or check, bid sheets, and EEO/MBE documentation inside the cover bid package submitted. Provide copies of the bid bond and EEO/MBE documentation punched and inserted into the bid package in Appendix B. Place copy of the bid sheets in Appendix G.

Any bidder may withdraw the bid(s), by written request, at any time prior to the hour set for the bid opening. If there is no withdrawal of the bid(s), in accordance with the above procedure, the City reserves the right to enforce said bid price(s) and/or contract.

The successful bidder, to whom the City may award the contract, shall be required to execute the contract, and furnish a surety bond satisfactory to the Service Director, within ten (10) days from the date of service of notice to that effect. In case of failure to do so, he will be considered as having abandoned it, and the deposit accompanying the proposal shall

thereupon be forfeited to the City of Canton, and the work may be re-advertised or awarded to the next higher bidder, as the Service Director may determine. Such bond shall be of an approved guaranty company, satisfactory to the Service Director in the sum of the total price bid for the completed work.

All questions pertaining to the project technical specifications and drawings can be directed to:

Douglas J. Harris, P.E.
Water Reclamation Facility
Phone: 330-438-4814
Cell: 330-316-0425

GENERAL SPECIFICATIONS

(The headings of the various sections are intended for convenience in reference and not to be considered a part of the specifications.)

(21) **Definitions:** The term “City” wherever used in these specifications shall mean the City of Canton, acting through its Service Director, or his properly authorized agents, such agents acting severally within the scope of the particular duties entrusted to them.

The term “Director” wherever used shall mean the Service Director of the City of Canton, duly appointed and holding office at the same time the contract was executed or during the fulfillment thereof.

The term “Engineer” whenever used, shall mean the City Engineer of said City or his properly authorized agents to the extent of the powers invested in them.

The term “Contractor” wherever used, shall mean the party of the second part entering into contract with the City for the performance of the work herein specified, or his properly authorized agents.

In all cases when the term “days” as used in these specifications shall be held to mean calendar days, unless otherwise noted.

The term “Work” wherever used, shall mean the furnishing of all labor, tools, machinery and the furnishing of all materials, except as herein otherwise specified, necessary to performing and completing of all the work herein specified. The methods and appliances used therefor must be such as will produce a satisfactory quality of work and ensure safety to the workmen, the public and to property.

Wherever, in the specifications, or upon the drawings and plans, the words directed, required, permitted, ordered, designated, prescribed, or words of like import are used, it shall be understood that the direction, requirement, permission, order, designation or prescription of the City is understood, and similarly, the words approved, acceptable, satisfactory to, refer to the City unless otherwise expressly so stated.

(22) **Decisions:** All the work under this contract shall be done to the satisfaction of the City, which in all cases shall determine the amount, quality, acceptability, and fitness of the several kinds of work and materials which are to be paid for hereunder, and shall decide all questions which may arise as to the fulfillment of this contract on the part of the Contractor, and the City’s determination and decision thereon shall be final and conclusive; and the City’s determination and decision in case of any question that may arise, shall be a condition precedent to the right of the Contractor to receive any money hereunder.

(23) **Orders to the Contractor and Failure to Execute:** The address given in the bid or proposal upon which this contract is founded is hereby designated as the place where all notices, letters and other communications to the Contractor shall be mailed or delivered. Such address may be changed at any time by a written notice from the Contractor and delivered to the City.

The Contractor must have on the work at all times, a foreman, superintendent or other competent representative, to whom orders and instructions may be given. Such orders and instructions shall have the same force and effect as if given directly to the Contractor.

Whenever instructions or orders which in the opinion of the Engineer require prompt or immediate attention, are neglected or ignored by the Contractor or his Superintendent, the Engineer shall have the power to place necessary men, machinery and materials on the work and charge the entire cost, including overhead expenses, to the Contractor, who shall either pay the entire cost and expenses into the City Treasury, or the amount thereof shall be deducted from money due the Contractor under the contract.

(24) **Subletting or assigning contract:** The Contractor shall give his personal attention to the faithful prosecution of the work, shall retain the same under his personal control and shall not assign by power of attorney or otherwise, nor sublet the work or any part thereof, without the previous written consent of the City, and shall not, either legally or equitably assign any of the money payable under this agreement, or his claim hereto except by and with the consent of the City.

Assigning or subletting of the whole or any portion of this contract shall not operate to release the Contractor or his bondsmen or surety hereunder from the contract obligations.

(25) **Subsidiary Contracts:** The Engineer may, when in his opinion, it becomes necessary, make alterations or modifications of the plans and specifications, or order additional materials and work, subject to the approval of the Director; and the Contractor shall be obliged to accept such alterations, modifications and additional work and materials not included in this contract. The price to be paid for the work under such altered or modified contract shall be agreed upon in writing, in a subsidiary contract for such portion of, or additional improvement and signed by the Director and Contractor, before such work is done; such additional work, alteration or modification shall be considered and treated as though originally contracted for and shall be subject to all the terms, conditions and provisions of the original contract, except that a material increase in the amount of work will be considered as a proper claim by the Contractor for an extension of the contract time for completion, by an amount to be determined by the City.

And it is expressly agreed and understood that such alterations, additions or modifications or omissions shall not, in any way, violate, or annul the original contract and the Contractor hereby agrees not to claim or bring suit for any damages, whether for loss of profits or otherwise, on account of such alterations, additions, modifications or omissions.

(26) **Inspection:** No material of any kind shall be used in the work until it has been inspected and accepted by the City. The Contractor must furnish all labor necessary in handling such material for inspection. All materials rejected must be immediately removed from the vicinity of the work. Materials or workmanship found at any time to be defective shall be immediately remedied by the Contractor, regardless of previous inspection.

The Engineer, his assistants, inspectors and agents, together with other parties who may enter into contracts with the City for doing work within the territory covered by this contract, shall, for all purposes which may be required by their contracts, have access to the work and the premises used by the Contractor, and the Contractor shall provide safe and proper facilities therefor.

The Engineer, his assistants and agents shall at all times have immediate access to all places of manufacture where materials are being made for use under this contract, and shall have full facilities for inspecting the same.

No work shall be done except in the presence of the Engineer, his assistants, agents or inspectors. It shall be the duty of such agents or inspectors to see that all materials used and all work done shall be strictly in accordance with these specifications, but such agents and inspectors shall have no authority whatsoever to order any change in materials, manner of doing the work or quantity of work done.

The field inspection of the work, testing of materials, giving lines and grades, preparation of general and detail drawings, except as otherwise specified, will be done by the Engineer. The inspection and supervision by the Engineer is intended to aid the Contractor in supplying all materials and in doing all work in accordance with the drawings and specifications, but such inspection shall not operate to release him from any of his contract obligations.

(27) **Time for doing work:** The City is instructing the Contractor to base the project schedule upon a 5-day workweek, Monday through Friday from 8:00 am to 4:30 pm except on City recognized holidays; this is the “standard schedule”. The Engineer may direct the Contractor to work outside of the standard schedule to save life or property or in case of emergencies. If the Contractor wishes to work outside of the standard schedule, the Contractor must submit this request in writing to the Engineer. The Engineer will review nonstandard scheduling and approve/deny the request. The Engineer will base his approval/denial upon benefit to the project, benefit to the City, and necessity to facilitate Contractor operations. Contractor must make special provisions for project inspection for nonstandard schedules and will be required to pay for all costs associated with inspection for approved nonstandard schedules. This includes both City personnel as well as consultants representing the City. The Engineer shall determine method of payment when the need arises. (See also Section 60).

(28) **Working Season:** Work done under these specifications, such as grading of streets and placing foundation for paving, curb setting, brick or other roadway paving, sidewalk laying, shall cease from the first day of December until the first day of April of the following year, unless otherwise directed by the Engineer. (See also Section 60).

(29) **Lines and grades:** All work done under this contract shall be done in accordance with the lines, grades and instructions as given by the City and as directed in the plans.

(30) **Order of procedure of work:** The Contractor shall proceed with the work at such points as the Engineer may direct, and not more than two adjoining blocks or squares in length, shall be torn up at the same time, unless otherwise directed by the Engineer; nor shall any block be closed to traffic, except where the Contractor is actually working.

Whenever, in the opinion of the City, it is necessary that certain portions of the work be done immediately, the Contractor upon written order from the Engineer, shall proceed with such work

without delay. Should he fail to so proceed, the City may do, or cause to be done, such work, and the cost of the same will be deducted from any money due, or to become due the Contractor under this contract.

(31) **Incompetent workmen:** Any employee of or persons connected with the Contractor who shall use profane or abusive language to the inspector, or other employees of the City, or otherwise interfere with them in the performance of their duties, or who shall disobey or evade the instructions of such employees of the City, or who is careless or incompetent, or who is objectionable to the City authorities, shall be discharged at the request of the Engineer, and shall not again be employed, except with his consent. Skilled labor only shall be used in the cases where the same is required.

(32) **Suspending the work:** The City, on account of public necessity, adverse weather conditions, or for other reasons, may order any portion or all work suspended, and thereupon the Contractor shall neatly pile up all materials, provide and maintain board walks and crossings, and take other means to properly protect the public and the work and to facilitate traffic. In case of such suspension of work, the time allowed for the completion of the work shall be extended in an amount equal to that lost by the Contractor, but the Contractor shall be entitled to no additional claim for damages therefor.

(33) **Forfeiture of contract:** Should the work to be done under this contract be abandoned by the Contractor, or if this contract or any part thereof be assigned or the work sublet by him without the previous written consent of the City or if at any time any official of the City or employee thereof become directly or indirectly interested in this contract or in furnishing the supplies or performing the work hereunder, or in any portion thereof; or if at any time the City may 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 provisions of this contract; or if the work be not fully completed within the time named in the contract; then and in any such case the City may notify the Contractor in writing to discontinue all work or any part hereof as may be designated, and the City may thereupon, according to law, enter upon and take possession of the work or part thereof, complete, or cause the same to be completed, and charge the entire expense of so completing the work or part thereof to the Contractor; and for such completion, the City itself or for its Contractors, may take possession of and use or cause to be used any materials, machinery, or tools of every description provided by the Contractor for the purpose of this work, and may procure or cause to be procured other materials, machinery, or tools required for the completion of the work.

All cost and expenses, including those of re-letting, (and damages resulting from the non-completion of the work within the specified time) incurred under these clauses, or by virtue of this contract, shall be deducted and paid by the City out of any monies then due or to become due the Contractor under and by virtue of this contract or any part thereof. In case such cost and expenses shall exceed the amount which would have been payable under this contract if the same had been completed by the Contractor, the Contractor or his sureties shall pay the amount of such excess to the City; and should such expense be less than the amount payable under this contract had the same been completed by the Contractor, he shall receive the difference, after deducting the amount retained as hereinafter specified, but shall not be entitled to damages for not being allowed to complete the work himself.

In case of abandonment of the work by the contractor, or its termination by the City, the

Director of Public Service shall at once cause the work already done under this contract to be measured. Five percent (5%) of the value of the amount thus shown will be set aside as a retainer under the provisions hereof. In such case no money, due or payable to the Contractor under this contract after the annulling of the same, shall be paid until the work is completed, accepted, and all claims and suits by reason of said work have been finally settled. The retained five percent (5%) shall be held for the full guaranty period, as specified herein and used as provided in other provisions hereof, for keeping in repair so much of the work as was done or completed under this contract.

(34) **Storing materials delivered on work:** All materials required in the work may be placed on the sides of the roadway, or parking area, or upon a portion of the sidewalk along the sides of the roadway to be improved and upon adjoining portions of intersecting streets, as directed by the Engineer; but all such materials shall be neatly and compactly piled in such a manner as to cause the least inconvenience to the property owners and the general public. All fire hydrants must at all times be kept free and unobstructed; water and gas shut off boxes must be left uncovered by such materials; and passageways must be left for store entrances, private driveways and street intersections.

No materials, tools or machinery shall be piled or placed against shade trees unless they be amply protected against injury therefrom, and all shade trees and other improvements must be protected from injury caused by the storing of materials or otherwise during the prosecution of the work.

All materials, tools, machinery, etc. stored upon public thoroughfares must be provided with red lights at night time, and danger signals by day, to warn the traffic of such obstructions.

(35) **Storage of materials, tools and machinery during suspension of work:** Upon the suspension, stoppage, or abandonment of the work, or any part thereof, all materials shall be neatly and compactly piled, and all tools and machinery so located as not to impede public traffic on roadways, sidewalks and crosswalks unnecessarily. All such stored materials, tools and machinery shall be provided with danger signals by day and red lights by night.

(36) **Ownership of old materials:** All old curbing, stone walk, paving brick, brick crosswalks, gutter paving bricks, gutter plates and culverts, sewer pipe and manholes, iron pipe and castings, are the property of the City and all such materials as are not ordered replaced, shall be removed by and at the expense of the Contractor, to such places as the Engineer may direct. If the Engineer chooses to not accept such materials, the Contractor must dispose of them at no cost to the City.

(37) **Plans, profiles, and specifications:** The plans, profiles and specifications are intended to be explanatory and supplementary of each other, but should any discrepancy appear or misunderstanding arise as to the import of anything contained in either, the explanation of the City shall be final and binding on the Contractor. Any correction of errors or omissions in the plans, profiles and specifications may be made when such corrections are necessary for the proper fulfillment of their intentions as construed by the City.

Any correction in the plans, drawings, and specifications made pursuant to the provisions of this paragraph shall not be retroactive, but shall take effect at the date of notification to the Contractor of such correction.

The City will furnish the Contractor with up to three (3) sets of additional copies of the plans (full size or half size, if available) as may be required, for the construction of the work herein specified.

(38) **Private rights of way:** Whenever it is required as a part of this contract to perform work within the limits of private property or private right of way, such work shall be done in conformity with the agreements between the City and such owners, and whether or not such a condition be a part of this agreement, care shall be taken to avoid injury to the premises entered, which premises must be left in a neat and orderly condition by the removal of rubbish and surplus materials and restoring vegetation to meet or exceed pre-contract condition.

(39) **Injunctions:** If legal obstructions to the prosecution of the work arise, the delay shall operate to extend the time allowed for the completion of the part or parts of the work obstructed, for the length of time obstruction continues and no longer, but no damages shall be claimed or allowed the Contractor for any such delay.

(40) **Attested accounts:** In case any person who has performed labor or has furnished materials, tools, or machinery for the work herein specified, he may file sworn itemized statement of the amount of value therein, as required by law, and if such claims be not disputed by the Contractor, or if the same are disputed, after the amount and validity have been determined by law, the City may pay the amount of such claims out of any money due the Contractor under this contract.

(41) **Claims for extra materials and work:** All claims for furnishing extra materials, or for doing extra work, for which the Contractor may consider himself entitled to receive extra compensation, must be presented to the Director of Public Service in writing, at the time the cause for such claim arises. Such statement must contain an itemized account of such materials and labor required, and unless such claim is so presented, it is expressly agreed, by the parties to this contract, that the Contractor has waived such claim, and that he shall not be entitled, subsequently to claim, or receive any pay for the same. No claim for extra labor and material shall be allowed, unless the necessity therefor has first been determined by the Director and the price to be paid therefor has been agreed upon, in writing, before such additional materials have been used, and such additional labor performed. See Change Order Policy in the Appendices for more information.

(42) **Claims for damage for omission or delays:** If any change or alteration involves the omission of any materials or work called for in the original plans and specifications, any claim for loss of profits, or any other cause growing out of any such omissions is hereby expressly waived by the Contractor.

No claims for prospective profits will be allowed, by reason of the inability of the City to proceed with all, or any part of the work provided for in this contract; nor for damages by reason of any delay on the part of the City, but any such delay shall entitle the Contractor to a corresponding extension of time for the completion of the work. See Claims Management Policy in the Appendices for more information.

(43) **Damages to property:** All damages to lawns, fences, trees, buildings, sidewalks, water, sewer or gas pipes, or other public or private property along or near the line of work, or the

vicinity thereof, if the same are occasioned through neglect or failure on the part of the Contractor, or that of any person in his employ, to take all necessary precautions to prevent the same, must be replaced or made good by him, to the satisfaction of the owners of same and at his cost and expense whenever the Engineer may so direct.

(44) **Liability of contractor for injuries, patents, etc.:** It is expressly understood and is hereby agreed that the whole of the work to be done is at the Contractor's risk. The contractor assumes by bidding under these specifications, the full responsibility and risk of all damages to the work itself, the property along the line of the work, injury to persons or animals which may be occasioned by floods, stoppage of water in sewers or gutters, caving in of surface of grounds or trenches, neglect in properly protecting work by barricades, etc., or any manner whatsoever. He shall bear all losses resulting to him on account of character of the work, or because the nature of the ground in or on which the work is done, is different from what was estimated or expected, or as may have been indicated by borings or test pits, or on account of the weather, actions of the elements or other causes.

He shall assume the defense of any indemnity and save harmless the City and its individual officers and agents from all claims relating to labor and materials furnished for the work to inventions, patents and patent rights used in doing the work, to injuries to any person or corporation received or sustained by or from the Contractor and his agents and employees in doing the work, or in consequence of any improper materials, methods, implements or labor used therein, or by reason of any condition in the improvement created by the Contractor or for any other liability therefor.

The Contractor, if required at any time by the Director, shall furnish the City satisfactory evidence that all persons who have claims for labor performed or material furnished hereunder, or have suffered damages on account of his operations, have been fully paid or secured. And in case evidence be not furnished as aforesaid and such amounts as the Director may consider necessary to meet lawful claims of persons aforesaid, shall be retained from the monies otherwise due the Contractor hereunder, until the liabilities shall have been fully satisfied.

If the Contractor shall claim compensation for any damages sustained by reason of the acts of the City, he shall within five (5) days after the sustaining of such damages, present a written statement to the City of the nature of the damage sustained. On or before the fifteenth day of the month succeeding that in which any such damage shall have been sustained, he shall file with the City an itemized statement of the details and amount of such damage, and unless such statement shall have been filed as thus required, his claim for compensation shall be forfeited and invalidated, and he shall not be entitled to any payment on account of such damage.

The statement of any specific duty or liability of the Contractor in any part of the specifications shall not be construed as a limitation or restriction upon any general liability or duty imposed upon the Contractor by these specifications, said reference to any specific duty or liability being merely for the purpose of explanation.

(45) **Safety measures -- barricades:** The Contractor must provide and maintain barricades to properly protect persons, animals, vehicles and property against injury. He shall also provide, place and maintain sign boards, letter "STREET CLOSED" in plain legible type, upon the streets and alleys in which the work is in progress and upon each street and alley intersection therewith at a distance of one block therefrom, as may be directed by the Engineer.

(46) **Traffic regulations:** The Contractor is responsible for all traffic control on the project whether or not it is called out in the detailed specifications or plans. All traffic control must comply with appropriate City, State, and Federal rules, regulation, and guidelines. During the progress of the work, the Contractor shall accommodate both the vehicular and foot traffic and shall maintain free access to fire hydrants, water and gas valves. Gutters and water ways must be kept open and other provisions made for the removal of storm water.

During the construction of the sewer work and other ditches, only one-half of the street intersections may be blocked at one time and the Contractor shall provide and maintain temporary driveways, bridges, and crosswalks over sewer and other trenches, such as, in the opinion of the Engineer in charge of the work, are necessary to reasonably accommodate the public.

To accommodate pedestrians during the progress of the work, the Contractor shall provide and maintain crosswalks on that portion of the street being improved, both across the main roadway and at the street and alley intersections. The crosswalks shall be constructed of planks two (2) inches thick, and within the fire limits of the City, they shall be at least five (5) feet wide, and outside the fire limits at least three (3) feet wide.

When the City deems it advisable or necessary to divert traffic from the work or any portion thereof, the Contractor shall provide and maintain detour signs, letter "DETOUR" in plain and legible type, and indicating the direction to be taken by traffic as directed by the Engineer.

In the event of the Contractor's failure to comply with the above provisions relative to traffic regulations, the City may cause said provisions to be carried out and the cost and expense of such work shall be deducted from any money due the Contractor under this contract, but the performance of any such work by the City, or at its insistence or request, shall in no way release the Contractor from his general or particular liability for the failure to provide for the safety of the public or the work under this contract.

The Contractor shall not place any material on any sidewalk so as to interfere with the free access to any crosswalk by pedestrians.

No additional compensation will be paid the Contractor by the provision and maintenance of bridges, crosswalks, etc., as above specified, but the cost and expense of maintaining the same shall be considered as part of the general contract and shall be included by the Contractor in the prices bid by him upon the several items as named upon the proposal therefor.

(47) **Hauling materials on paved streets:** During the progress of the work and in the cleaning up thereof, the Contractor shall provide and use vehicles in which the excavated or other materials are hauled over paved streets in the City, with tight bodies for transportation of fine materials and shall not overload the same so as to allow such materials to fall off the tops thereof upon the streets. The paved streets over which such material is hauled must be kept free from dirt and other materials in accordance with the provisions of City Ordinance regulating same.

(48) **Cleaning up during the progress and completion of work:** During the progress of the work the Contractor shall remove all surplus excavated materials, obstructions, old materials not

used, trees, stumps, filth or rubbish of any kind that may be encountered in the execution of the work, at his own cost and expense except when the removal and transplanting of trees be specified and bids therefor are required upon the blank proposal attached thereto.

As fast as any portion of the work, such as the construction of sewers or drains not located in the street or streets to be improved under the contract is completed, the backfilling of trenches and the repaving over the same shall be done as soon as possible, as herein specified.

As fast as the roadway pavement is completed, the Contractor shall remove all rubbish and surplus materials which have accumulated during the progress of the work provided herein, from the new or existing sewers, the roadway, sidewalk space and intersecting streets and shall render the streets suitable, safe and convenient for traffic.

Upon the completion of the improvement and before the final acceptance thereof, the Contractor shall remove all machinery, tools, temporary building and shall clean the pavement, curb and sidewalks in such a thorough and effective manner by hand sweeping, scraping or by flushing, according to kind of pavement or condition of the street, as will be determined by the Engineer, so as to leave the entire surface of the pavement, curbs and sidewalks so exposed that the quality and texture of the materials used and workmanship may be readily determined. He shall also remove all centering, scaffolding and accumulations of sand, earth, materials, and rubbish of all kinds from the sewers, manholes, inlets, and catch basins. If the improvement is completed too late in the fall to permit all of the cleaning up as herein specified, that portion not completed shall be done the following spring within ten (10) days after written notice to do so from the Engineer.

All such cleaning and removal of cleanings shall be done by the Contractor and the cost and expense thereof shall be included in his price for furnishing of materials and laying of pavement.

In case the Contractor shall fail or neglect to do any cleaning within forty-eight (48) hours after the receipt of notice to do so, or in the manner specified, the Director of Public Service may and is hereby authorized to cause the same to be done and charge the cost and expense thereof to said Contractor and deduct the amount of such cost and expense from any estimate due him at any time thereafter.

(49) Existing surface fixtures and structures: At least forty-eight (48) hours before breaking ground, the Contractor shall notify all the City Departments and public service corporations, whose tracks, wires, pipes, conduit or other structures may be affected by his operations. He shall likewise notify the Chief of the Fire Department of the temporary blocking of any street.

Existing surface structures which may be encountered in the work shall be removed and replaced or maintained by the Contractor at his cost and expense, or by the parties interested, and in such a manner as to secure the safety of the public and structure. The use of pipes, conduits, etc. shall not be interrupted without the consent of the parties owning or controlling the same.

(50) Existing sub-surface fixtures and structures: Existing sub-surface structures encountered in the work shall be protected and maintained in complete operation, unless permission is given for their removal. Existing substructures, including old sewers, abandoned sewers, abandoned drains, etc., which may appear within the limits of the excavating, shall be

removed, if required by the City, but such removal will not be paid for separately, except when expressly specified, being paid for in the price for excavation or other items including excavation.

In case the uncovering of sub-surface structures necessitates a change in the alignment of grade of the proposed work, the Contractor shall give immediate notice of such obstruction to the Engineer, and shall cease work at such points until ordered to proceed.

And in case any change of grade or alignment shall delay the work, the time allowed for the completion of the contract will be extended to the extent which the delay shall have operated, the decision of the Engineer upon this point being final.

(51) City may construct sewers, drains, etc.: The City reserves the right to suspend or stop the work on all or any part of the progressing improvement, for the purpose of laying, relaying or allowing to be laid, or re-laid, any sewers, drains, gas pipes, water pipes, conduits or appurtenances thereto, which, in the opinion of the Director of Public Service are necessary or expedient, or for any other reason, and at any stage of the work, and the Contractor shall not interfere with or place any impediment in the way of any person or persons engaged in such work; and in such cases the Contractor shall not be entitled to any damages or recompense, either for digging up the street, or delay or hindrance, but the time of completion shall be extended as many days as the delay shall have operated.

It is the intention of the City to require all property owners to have water and sewer connections made to all lots, and to cause to be laid all water mains, gas mains, sewers and sewer connections, and other pipes, conduits, etc., not included in the contract hereunder, in advance of the improvement, except when in the opinion of the Director of Public Service such procedure be impracticable and the Contractor shall not be entitled to damages or recompense by reason of delay or hindrance, but he shall be granted an extension of time equal to that in which the delay shall have operated, as determined by the Director of Public Service.

If the Contractor hereunder finds that the trenches are not properly backfilled, he shall so notify the Engineer in writing, allowing ample time to have the defects remedied before proceeding with the improvement.

The Contractor may exercise the right to such supervision of the work, as he may deem necessary to insure good material and workmanship, in order that he may properly protect himself from defects in the finished pavement for which he will be responsible under his guaranty. The Contractor will be allowed and paid for any additional materials, the use of which is made necessary on his part by reason of the above specified work, such reasonable sum (not to exceed contract price) as may be agreed upon in writing between himself and the Director before such additional materials be used, and in the manner specified for subsidiary contracts.

(52) Special repairs: The City reserves the right, whenever in its judgment, to take up or permit the taking up of any part of the improvement during the progress of the work, or subsequent to the completion thereof and during the period of guaranty for the purpose of constructing, repairing, or renewal of any sewers, drains, water or gas pipes, or other improvements. Whenever any part of the improvement is taken up as herein specified, all the work of restoring the same will be done by or under the direction of the City and the Contractor hereunder will be relieved of any maintenance requirements on that portion of the completed improvement so disturbed.

(53) **Use of city water supply:** The City will furnish water at the hydrants for the purpose of puddling trenches, construction purposes, operation of machinery, mixing concrete, mortar, etc., but the cost of water and the proper facilities for conveying the same from the hydrants must be included by the Contractor in the unit prices bid for the various items of work wherein water will be used. All water used must pass through meters installed by the Water Department at its hydrants and subject to its regulation and paid for at the builder's rate per one thousand (1,000) cubic feet of water consumed, as established by said Department, plus the cost of meters and installation of same. A deposit will be required covering the cost of meter and installation thereof, which deposit of cost of meter will be refunded on return of meter in good condition.

The Contractor must notify the Water Department at least forty-eight (48) hours in advance of the time such installation is required.

(54) **Use of sewer:** At any time during the progress of the work the City may, by written notice to the Contractor, take over and utilize the whole or part of any sewer, drain or appurtenance thereof which has been completed, giving if desired, permits to tap and connect therewith. In such event, the Contractor shall be relieved from the maintenance of such part as may be used except as provided under the section "Guaranty" and such will be deemed as final acceptance by the City of the part or parts used, subject to the responsibility of the Contractor for all defects in workmanship, etc., as provided under the "Guaranty" section of these specifications.

(55) **Sanitary regulations:** Necessary sanitary conveniences for the use of the laborers on the work, properly secluded from public observation, shall be constructed and maintained in a sanitary condition by the Contractor in such manner and at such points as shall be approved, and their use shall be strictly enforced.

(56) **OSHA standards:** It is the City's requirement, under OSHA Regulations, that all outside contractors hired by the City of Canton are and will be in full compliance with all OSHA standards and perform said work in accordance with all applicable OSHA standards.

(57) **Laws and ordinances:** The Contractor shall keep himself fully informed of all laws, municipal ordinances and regulations that in any manner affect the persons engaged in or employed upon the work, or the materials used in the work, or any way affecting the conduct of the work, and of the decrees of the bodies or tribunals having jurisdiction or authority over the same. He shall also himself observe and comply with and shall cause all of his agents and employees to observe and comply with all such existing and subsequent laws and ordinances, regulations, orders and decrees, and to protect and indemnify the City against claim or liability arising from or based upon the violation of such laws, ordinances, regulations, orders or decrees by himself or by his agents or employees.

References to special laws and ordinances in other sections of this contract shall in no way relieve the Contractor from compliance with all the provisions of this section.

(58) **Monuments and landmarks:** The Contractor shall preserve intact all City monuments, benchmarks and landmarks, as shown upon the plans or encountered in the excavation. In such case that such monument, benchmark or landmark not shown on the drawings be encountered in opening the excavation, the Contractor shall stop work at such point, immediately notify the

Engineer of such findings and not disturb same until directed to do so by the Engineer.

(59) **Prices:** The City shall pay and the Contractor shall receive the prices hereafter stipulated as full compensation for everything furnished and done by the Contractor under this contract. This shall include all incidental work required but not specifically mentioned, and also for all loss or damage arising out of the nature of the work, or from the action of the weather, floods, or from unforeseen obstruction or difficulty encountered in the prosecution of the work, and for the expenses incurred by or in consequence of the suspension or discontinuance of the work as herein specified, and for well and faithfully completing the work and the whole thereof, as herein provided, together with the remedying of all defects developing during the prosecution of the work and during the period for which the work is guaranteed.

(60) **Starting and completing the work (Contract Duration):** The Contractor shall not start the work embraced in this contract before the date of a written notification from the Engineer, and shall commence at such points as the City may direct.

If the work done under this contract conflicts with other work done for or by the City, or with its consent, the City shall determine the time and manner of procedure of the operations carried on under this contract.

The number of days allowed for the completion of the work in this contract shall be 150 calendar days from the Notice to Proceed date.

Work is not to be suspended from December 1st to April 1st. Contractor will be responsible for either maintaining a suitable pavement surface, i.e., asphalt, concrete or low-strength mortar, or assume snow/ice removal for all areas affected to the satisfaction of the City. Payments or compensation will not be made to contractor for re-mobilization, equipment overhead, etc. resulting from weather-related work suspension. Contractor is responsible for any additional costs due to weather-sensitive construction, such as, but not limited to, protecting concrete from freezing, heating of water as needed, etc. as well as insuring that all materials used satisfy appropriate specifications such as, but not limited to, asphalt temperature specifications, non-frozen backfill material, etc.

The permitting of the Contractor to complete the work or any part thereof, after the time fixed for its completion, shall in no way operate as a waiver on the part of the City of any of its rights under this contract.

(61) **Defaulted provisions for delay:** The Contractor guarantees that he can and will complete the work on or before the time affixed in his bid, or on or before the extended time as provided for in the contract. The payment to the City for such delay and failure on the part of the Contractor shall be defaulted amount of Five-Hundred Dollars (\$500.00) for each day by which the Contractor shall fail to complete the work, or any part (including Interim) thereof, in accordance with the provisions of the contract. The City will deduct and retain, from any money due or any money to become due under the contract, the amount of the liquidated damages. The Contractor shall be liable for the payment of the difference upon demand of the City.

(62) **Samples:** Each bidder shall submit samples of materials, or refer to samples of materials furnished by the Manufacturer or Producer, at the time of submitting the bid, as required in detail specifications under each item, for which bids are received. Whenever samples of any material or workmanship have been filed by the Contractor, or are on file as specimen of the work to be

done or materials to be furnished for the work herein specified, such samples shall be the standard by which that kind and class of work shall be judged.

(63) **Measurements:** The contract will not use extra or customary measurements of any kind, unless specially noted, in measuring the work under these specifications; the length, area, solid contents or number only, are considered as a basis for payment as hereinafter specified.

The measurements as made by the City of the amount of the work done shall be final and conclusive.

Payments will be made upon the work done within the lines prescribed by the plans, drawings or specifications, and in accordance with the unit prices for the items under which the work is done. Nothing therein contained depriving the City of any remedy or defense it may have under the same, for violation of the terms or conditions of this agreement.

(64) **Partial payments:** The Contractor shall, on a day of each calendar month as is mutually agreeable to the Contractor and the City, make an approximate estimate of the quantities and prices of the labor furnished and the materials incorporated into the project during the previous calendar month and forward such estimate to the Engineer for approval. More frequent estimate submission, at the option of the City, may be made at any time during the progress of the project.

Partial payments to the Contractor for work performed for a lump sum price shall be based on a well-balanced schedule prepared by the Contractor and approved by the Engineer which schedule shall apportion the lump sum price to the principal features entering into or forming a part of the work covered thereby.

Partial payments to the Contractor for labor performed and materials furnished shall be made at the rate of ninety-two (92) percent of the estimate submitted by the Contractor and approved by the Engineer until the project is fifty (50) percent completed. The reimbursement rate will be one hundred (100) percent of such estimates after the project is fifty (50) percent completed. **The City will not make payment for materials stored on site.**

The City shall pay the Contractor monthly, not less than the difference between the amount of each monthly estimate which has been approved by the Engineer and the sum of Retainage stipulated below and any other amounts which the City is authorized by the contract to withhold. The making of any monthly payment shall not be taken or construed as approval or acceptance by the City of any work included in the estimate upon which such payment is based.

If the City fails to make payment within sixty (60) days after approval by the Engineer, in addition to other remedies available to the Contractor, there shall be added to each such payment interest at the average of the prime rate established at the commercial banks in the city of over one hundred thousand population nearest the construction project, commencing on the first day after said payment is due and continuing until the payment is received by the Contractor.

To aid in determining quantities of materials for pay, the Contractor shall, whenever requested by the Engineer, provide scales, equipment and assistance for weighing or for measuring such materials.

For estimating quantities in which computation of areas by geometric methods would be comparatively laborious, the City agrees that a planimeter or other agreed upon method may be used.

(65) (66) **Pre-final and final estimates and payments:** As soon as practicable after the completion of work under the contract, the Engineer will perform a formal inspection of the project. If the project appears to be acceptable, the Engineer will recommend tentative acceptance thereof and make a pre-final estimate of the amount of the work done by the Contractor based on quantities and prices submitted by the Contractor. Upon such certified pre-final estimate, the City will pay the Contractor all of the monies owing him under the contract, except the Retainage, which the City will hold for sixty-day (60) period after the date of the pre-final estimate.

Upon the expiration of such sixty (60)-day period, provided that it appears upon further inspection and certification by the Engineer that the contract has been faithfully performed, the City will pay to the Contractor the whole sum retained or such part thereof as remains after deducting expenses of correcting any deficiencies in the work as determined by the Engineer. Such final inspection and payment will not discharge the liability of the Contractor under the contract or of the surety under the contract bond, but such liabilities and all guarantees shall remain in effect for the period fixed by law.

(67) **Additional contract:** It must be distinctly understood that should more than one contract be awarded to the same Contractor, he may be required to prosecute the work upon all of them at one and the same time. At the option of the Director, and he shall not be permitted to transfer men, tools, or machinery from one job to another without the consent of the Engineer. The contractor shall at all times have a competent foreman and a sufficient number of men, tools, and machinery upon each job, at the same time, as well, in the opinion of the Engineer, be sufficient for the proper prosecution of the work.

(68) **Insurance:** The Contractor shall at all times during the progress of the work, comply with all the provisions of the laws of Ohio relating to workmen's compensation and State insurance fund for the benefit of injured and the dependents of killed employees. The Contractor shall at all times during the progress of the work carry accident liability insurance in an amount sufficient to reasonably indemnify himself against loss from claims for personal injuries or fatal accidents occurring upon the work or caused thereby including injuries and accidents to employees of the Contractor, persons engaged on the work under another contractor, employees of any sub-contractor or other engaged on or about the work and the public. The City reserves the right to annul this contract at any time upon receiving evidence of the Contractor's failure to comply with the statutes as described above.

(69) **Last payment to terminate liability of City:** No person or corporation, other than the signer of this contract as Contractor, has now any interest hereunder, and no claim shall be made or be valid, and neither the City nor its agents shall be liable for, or be held to pay any money, except that provided in this contract. The acceptance by the Contractor of the last payment made as aforesaid shall operate as and shall be a release to the City and agents 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 of any person relating to or affecting the work, except the claim against the City for the remainder, if there be any, of the amount kept or retained.

(70) **Guaranty:** The Contractor, for and in consideration of the monies received and to be received by him, hereby agrees that the repairs of all defects in the work done and completed under this contract arising, in the opinion of the Director, out of the use of defective materials, settlements of sewers, structures, and foundations or improper workmanship in the construction thereof, and which repairs from such causes may become necessary during the period of years, as set forth below, after the date of the approval by the Director of the Engineer's certificate of the "FINAL COST", shall be made by him without cost and expense to the City, and the Contractor agrees to make such repairs when, and as ordered by the Director, by written notice served upon him and if after having received such notice, the Contractor fails to make such repairs within the number of days stated in such notice, from the date of receipt thereof, the Director shall thereupon have the power to cause said repairs to be made and charge the cost and expense thereof to the Contractor or his surety.

The failure of the Director to give notice within the specified period shall not preclude the operation of this section.

The guaranty periods referred to above in this section shall be as follows:

Protective Polymer Lining, 10 years

Concrete curbing, 1 year

Concrete sidewalks, 1 year

Concrete masonry, 1 year

Brick masonry, 1 year

Sewers, manholes, catch basins, 1 year

Asphaltic concrete pavement, 1 year

Concrete foundation, 1 year

(71) **No estoppel:** The City shall not be precluded or estopped by any return or certificate made or given it, from showing at any time, either before or after the final completion and acceptance of the work and payment therefor pursuant to any such return or certificate, the true and correct amount and character of the work done and materials furnished by the Contractor or any other person under this agreement, or from showing at any time that any such return or certificate is untrue and incorrect or improperly made in any particular, or that the work and materials, or any part thereof, do not in fact conform to the specifications; and the City shall not be precluded or estopped, notwithstanding any such return or certificate and payment in accordance therewith, from demanding and recovering from the Contractor such damages as it may sustain by reason of his failure to comply with the specifications.

Neither the acceptance by the City, nor any order, measurement, or certificate, by the City, nor any order for payment of money, nor any payment for, nor acceptance of the whole or any part of the work by the City, nor any extension of time, nor any possession taken by the City, or its employees, shall operate as a waiver of any portion of this contract or of any power herein

reversed to the City, or any rights to damages herein provided; nor shall any waiver of any breach of this contract be held to be a waiver of any other or subsequent breach.

DETAILED SPECIFICATIONS

(72) The following specifications shall apply in conjunction with the General specifications. In case of a conflict between the General and Detailed specifications, the Detailed Specifications shall take precedence.

(72.1) **Description of Work:** This project consists of removing and replacing two (2) sanitary manholes, rehabilitating four (4) additional manholes and all associated work as per plan on Trinity Avenue NW and Caprice Avenue NW.

(72.2) **Applicable Specifications:** All materials and work shall conform to State of Ohio, Department of Transportation 2010 Construction and Materials Specifications (CMS) in conjunction with applicable City of Canton Standard Drawings and Supplemental Specifications and project specific specifications included herein.

(72.3) **Asphalt Concrete:** Contractor shall submit applicable approved JMF for acceptance by the Engineer prior to use. Associated reports and daily plant production reports shall be submitted. Asphalt delivery tickets shall include JMF number. Contractor must supply the Engineer with applicable tons-to-cubic yard conversion factor, prior to paving.

(72.4) **Maintaining Traffic:** Maintenance of traffic shall be the responsibility of the contractor and incidental to the contract price. Temporary traffic control shall conform to all applicable City and State standards. Contractor shall coordinate access with private property owners as required to complete the project. See the plans for additional details.

(72.5) **Technical and Supplemental Specifications:** See following pages.

SECTION 02200

EARTHWORK

PART 1 - GENERAL

1.1 WORK INCLUDED

- A. This section includes earthwork and related operations, including but not limited to dewatering; excavating all classes of material encountered; pumping, draining, and handling of water encountered in the excavations; handling, storage, transportation, and disposal of all excavated and unsuitable material; backfilling around structures and pipe; backfilling all trenches and pits; compacting; all sheeting, shoring, and bracing; preparation of subgrades; surfacing and grading; and any other similar, incidental, or appurtenant earthwork operation which may be necessary to properly complete the work.
- B. Provide all services, labor, materials, and equipment required for all earthwork and related operations necessary or convenient to the Contractor for furnishing a complete work as shown on the Drawings or specified in these Contract Documents.

1.2 GENERAL

- A. The elevations shown on the Drawings as existing are taken from the best available data and are intended to give reasonable, accurate information about the existing elevations. They are not precise, and the Contractor should satisfy himself as to the exact quantities of excavation and fill required.
- B. Perform earthwork operations in a safe and proper manner taking appropriate precautions against all hazards.
- C. Maintain in good condition at all times all excavated and fill areas for structures, trenches, fills, topsoil areas, embankments, and channels until final acceptance by the Owner. Repair all damage caused by erosion or other construction operations using material of the same type as the damaged materials.
- D. Earthwork operations within the rights-of-way of the State Department of Transportation, the County Engineer's Department, and the respective Townships, Villages or Cities shall be conducted in accordance with the requirements and provisions of the permits issued by those agencies for the construction within their respective rights-of-way. Such requirements and provisions, where applicable, shall take precedence over and supersede the provisions of these Specifications.
- E. Control grading to prevent water running into excavations. Obstruction of surface drainage shall be avoided and a means shall be provided whereby storm water can be uninterrupted in existing gutters, other surface drains, or temporary drains. Material for backfill or for protection of excavation in public roads from

surface drainage shall be neatly placed and kept shaped so as to cause the least possible interference with public travel. Free access must be provided to all fire hydrants, valves, meters, and private drives.

- F. No classification of excavated materials will be made. Excavation and trenching work shall include the removal and subsequent handling of all materials excavated or otherwise removed in performance of the contract work, regardless of the type, character, composition, or condition thereof.
- G. All earthwork operations shall comply with the requirements of OSHA Construction Standards, Part 1926, Subpart P, "Excavations, Trenching, and Shoring," and Subpart O, "Motor Vehicles, Mechanized Equipment, and Marine Operations," and shall be conducted in a manner acceptable to the Engineer.
- H. It is understood and agreed that a thorough investigation by the Contractor has been made of the surface and subsurface conditions of the site and any special construction problems which might arise as a result of nearby watercourses and floodplains, particularly in areas where construction activities may encounter water-bearing sands and gravels or limestone solution channels. Provide all services, labor, equipment, and materials necessary or convenient for completing the work within the time specified in these Contract Documents.

1.3 MEASUREMENT AND PAYMENT

- A. No separate measurement or payment will be allowed for this work. Payment for all work performed under this section shall be included in other items of work.

PART 2 – PRODUCTS (Not Applicable)

PART 3 - EXECUTION

3.1 INITIAL SITE PREPARATION

- A. Preparatory to beginning construction operations, remove from the site all vegetative growth, trees, brush, stumps, roots, debris, and any other objectionable matter, including fences, buildings, and other structures shown on the Drawings in the construction areas which are designated for removal or which, if left in place, would interfere with the proper performance or completion of the contemplated work, would impair its subsequent use, or would form obstructions therein.
- B. Fill all holes or cavities which extend below the subgrade elevation of the proposed work with compacted layers of crushed rock or earth backfill conforming to the requirements specified here for backfill. Do not incorporate organic material from clearing operations in excavation backfill or embankment material.

- C. Exercise special precautions for the protection and preservation of trees, cultivated shrubs, sod, fences, buildings, and other structures located in the construction area. Repair or replace any of the aforementioned items damaged by Contractor's operation or construction activities.
- D. Remove and dispose of any excess material resulting from clearing or site preparation operations. Dispose of such materials in an acceptable manner.

3.2 DEWATERING

- A. Provide and maintain at all times during construction ample means and devices with which to promptly remove and properly dispose of all water from any source entering the excavations or other parts of the work. Dewatering shall be accomplished by methods which will ensure a dry excavation and preservation of the final lines and grades of the bottoms of excavations. Methods of dewatering may include sump pumps, well points, deep wells, or other suitable methods which do not damage or weaken structures, foundations, or subgrades. Shallow excavations may be dewatered using open ditches, provided such ditches are kept open and free-draining at all times.
- B. If foundation soils are disturbed or loosened by the upward seepage of water or an uncontrolled flow of water, excavate and replace the affected areas with crushed rock.
- C. Dispose of the water from the work in a suitable manner without damage to adjacent property. Conveyance of the water shall not interfere with traffic flow. Do not drain water into work built or under construction. The Contractor will be held responsible for the condition of any pipe or conduit which he may use for drainage purposes, and all such pipes or conduits shall be left clean and free of sediment.

3.3 EXCAVATION

A. GENERAL

1. Excavation shall include the removal of all material from an area necessary for the construction of a pipeline or structure. Excavations shall provide adequate working space and clearances for the work to be performed therein.
2. Where quicksand, soft clay, spongy or swampy earth, or other materials unsuitable for subgrade or foundation purposes are encountered below the excavation limits, they shall be removed and disposed of to the level of suitable material. Areas so excavated shall be backfilled in accordance with City of Canton Standard Drawing No. 19.
3. Place barriers at each end of all excavation and at such places as may be necessary along excavations to warn all pedestrian and vehicular traffic of such excavations. Place lights along excavations from sunset each day to sunrise of the next day until the excavations are backfilled. Barricade all

excavations in such a manner as to prevent persons from falling or walking into any excavation.

B. ROCK EXCAVATION

1. Rock encountered in the process of excavation for structures shall be uncovered and stripped of all loose materials over the entire limits of excavation. Rock encountered for removal in a trench section shall be uncovered for a distance of not less than 50 feet.
2. Drilling and ripping operations shall be conducted with due regard for the safety of persons and property in the vicinity and in strict conformity with requirements of all ordinances, laws, and regulations. Conduct rock excavation near existing pipelines or other structures with the utmost care to avoid damage. Promptly repair injury or damage to other structures and properties to the satisfaction of the Owner by the Contractor at his own expense.

C. TRENCH EXCAVATION

1. Trench excavation shall consist of the removal of materials necessary for the construction of pipelines.
2. Excavation for pipelines shall be made in open cut unless shown otherwise on the Drawings, or as specified elsewhere. Trenches shall be cut true to the lines and grades shown on the Drawings. The banks of trenches shall be cut in vertical, parallel planes equidistant from the pipe centerline. From an elevation 12 inches above the top of the pipe to the bottom of the trench, the horizontal distances between vertical planes for different sizes of pipe shall not exceed those shown on the Drawings. The bottom of the trench shall be cut carefully to the required grade of the pipe except where bedding materials or cradles are shown, in which case the excavation shall extend to the bottom of the bedding or cradles as shown on the City of Canton Standard Drawings. Minimum pipe cover shall be as shown on the City of Canton Standard Drawings.
3. Bell holes for bell and spigot pipe and/or mechanical joint pipe shall be excavated at proper intervals so the barrel of the pipe will rest for its entire length upon the minimum depth of bedding as shown on City of Canton Standard Drawings. Bell holes shall be large enough to permit proper installation of all joints in the pipe. Bell holes shall not be excavated more than 10 joints ahead of pipe laying. No part of any bell or coupling shall be in contact with the trench bottom, trench walls, or granular embedment while the pipe is jointed.
4. Excavation for manholes, outlets, collars, saddles, piers, and other pipeline structures shall conform to the additional requirements specified herein.

5. Pipe trenches shall not be excavated more than 400 feet in advance of pipe laying and all work shall be performed to cause the least possible inconvenience to the public. Adequate temporary bridges or crossings shall be constructed and maintained where required to permit uninterrupted vehicular and pedestrian traffic.
6. Wherever pipe trenches are excavated below the elevation shown on the Drawings, the Contractor, at his own expense, shall fill the void thus made to the proper grade with material meeting the requirements of extra foundation material per City of Canton Standard Drawing No. 19.
7. In all cases where materials are deposited along open trenches, they shall be placed so that no damage will result to the work and/or adjacent property in case of rain or other surface wash.

3.4 BACKFILLING

A. Materials for backfilling shall conform to the Canton Standard Drawing No. 19.

B. GENERAL

1. Earth backfill shall be compacted to not less than 90 percent of the maximum density as determined by ASTM D 698 at a moisture content within 3 percentage points, unless otherwise specified herein. Crushed stone and sand shall be compacted to not less than 83 percent of the solid volume density as determined from the bulk specific gravity by AASHTO T-84 and T-85 and the dry weight of the aggregate.
2. Material that is too dry for adequate compaction shall receive a prior admix of sufficient water to secure optimum moisture content. Material having excessive water content shall not be placed at any time.
3. Backfill material required to be compacted shall be placed in horizontal layers not to exceed 6 inches in thickness (before compaction) and compacted in place by ramming, tamping, or rolling, unless otherwise specified herein. Compaction shall be accomplished by power-driven tools and machinery wherever possible. Compaction and consolidation of sand and crushed stone backfill shall be accomplished using vibrating equipment in a manner acceptable to the Engineer.

C. BACKFILLING TRENCHES

1. The backfilling of pipeline trenches shall be started immediately after the construction of same. Select backfill or crushed stone as shown on the Drawings shall be placed in the trench under and on each side of the pipe in 6-inch layers for the full width of the trench and thoroughly and uniformly compacted by ramming and/or tamping to a minimum of 90 percent of the maximum density determined as specified herein. Select earth backfilling or crushed stone shall start above the pipe bedding. Sufficient select backfill or crushed stone shall be placed around the pipe

and compacted to provide a cover of not less than 12 inches over the top of the pipe. Mechanical compactors or tampers shall not be used within 12 inches of pipe. Compaction in this area shall be accomplished by hand methods. Backfilling shall proceed simultaneously on both sides of the pipe to prevent lateral displacement.

2. Caution shall be used during backfill operations for PVC or other flexible thermoplastic pipe to prevent pipe deformation. PVC or other flexible thermoplastic pipe shall not be subjected to roller or wheel loads until a minimum of 36 inches of backfill has been placed over the top of the pipe. A hydrohammer shall NOT be used until a minimum depth of 48 inches of backfill has been placed over the top of the pipe.
3. In streets and alleys, across sidewalks and driveways, and at any other places subject to vehicular traffic or other superimposed loads, low strength mortar may be placed from the level of 12 inches above the top of the pipe upward for the full depth of the trench.
4. All backfilling shall be done in such a manner that the pipe or structure over or against which it is being placed will not be disturbed or injured. Any pipe or structure injured, damaged, or moved from its proper line or grade during backfilling operations shall be removed and repaired to the satisfaction of the Engineer and then rebackfilled.

3.5 DISPOSAL OF WASTE AND UNSUITABLE MATERIALS

- A. All excavated materials not re-used with the City Engineer's approval for such purposes shall be considered as waste materials and the disposal thereof shall be made in an acceptable manner.
- B. Unsuitable materials, consisting of wood, vegetable matter, debris, soft or spongy clay, peat, and other objectionable material shall be removed from the work site.
- C. The Contractor is responsible for any and all permits and other requirements, such as sediment runoff control necessitated by the disposal of waste material.

3.6 FINAL GRADING

- A. After other earthwork operations have been completed, the site shall be graded to elevations existing before the construction. The finished surfaces shall be left in smooth and uniform planes such as are normally obtainable from the use of hand tools. If Contractor is able to obtain the required degree of evenness by means of mechanical equipment, the use of hand labor methods will not be required.
- B. Grade and dress all finished ground surfaces to present a surface varying not more than plus or minus 0.10 foot as regards local humps or depressions.

END OF SECTION

SECTION 02270

SLOPE PROTECTION AND EROSION CONTROL

PART 1 - GENERAL

1.1 SCOPE

- A. This section shall consist of temporary control measures as shown in the plans or directed by the Engineer during the life of the Contract to control erosion and water pollution through the use of berms, dikes, dams, sediment basins, fiber mats, netting, mulches, grasses, slope drains, temporary silt fences, and other control devices.
- B. The temporary pollution control provisions contained herein shall be coordinated with the permanent erosion control features to assure economical, effective, and continuous erosion control throughout the construction and post-construction periods.
- C. Develop a site-specific sediment and erosion control or storm water management plan for all construction activities that disturb 1 acre or more. The Storm Water Pollution Plan (SWP3) shall incorporate the sediment and erosion control measures shown on the Drawings as well as written procedures and methods that the Contractor shall utilize during the performance of the work to mitigate stream pollution due to storm water runoff.
- D. The SWP3 shall be in conformance with Section 319 of the Federal Clean Water Act and the Ohio EPA, Division of Surface Water requirements as listed in their "Checklist for Construction Sites". The SWP3 shall be submitted to the Owner for approval at least 30 days before construction activities are to begin.
- E. While performing work, utilize Best Management Practices (BMP) similar to those listed in the publication titled "Rainwater and Land Development, Ohio's Standards for Stormwater Management Land Development and Urban Stream Protection" as prepared by the Ohio Department of Natural Resources Division of Soil and Water Conservation, Fountain Square Court, Columbus, Ohio, 43224, (614) 265-6610.

1.2 MEASUREMENT AND PAYMENT

- A. No separate measurement or payment will be allowed for this work. Payment for all work performed under this section shall be included in other items of work.

PART 2 - PRODUCTS

2.1 TEMPORARY BERMS

- A. A temporary berm is constructed of compacted soil, with or without a shallow ditch, at the top of fill slopes or transverse to centerline on fills.
- B. These berms are used temporarily at the top of newly constructed slopes to prevent excessive erosion until permanent controls are installed or slopes stabilized.

2.2 TEMPORARY SLOPE DRAINS

- A. A temporary slope drain is a facility consisting of stone gutters, fiber mats, plastic sheets, concrete or asphalt gutters, half-round pipe, metal pipe, plastic pipe, sod, or other material acceptable to the Engineer that may be used to carry water down slopes to reduce erosion.

2.3 SEDIMENT STRUCTURES

- A. Sediment basins, ponds, and traps are prepared storage areas constructed to trap and store sediment from erodible areas in order to protect properties and stream channels below the construction areas from excessive siltation.

2.4 CHECK DAMS

- A. Check dams are barriers composed of logs and poles, large stones, sand bags, or other materials placed across a natural or constructed drainway.
- B. Stone check dams shall not be utilized where the drainage area exceeds 50 acres. Log and pole structures shall not be used where the drainage area exceeds five acres.

2.5 TEMPORARY SEEDING AND MULCHING

- A. Temporary seeding and mulching are measures consisting of seeding, mulching, fertilizing, and matting utilized to reduce erosion. All cut and fill slopes, including waste sites and borrow pits, shall be seeded when and where necessary to eliminate erosion.

2.6 BRUSH BARRIERS

- A. Brush barriers shall consist of brush, tree trimmings, shrubs, plants, and other approved refuse from the clearing and grubbing operation.
- B. Brush barriers are placed on natural ground at the bottom of fill slopes, where the most likely erodible areas are located, to restrain sedimentation particles.

2.7 BALED HAY OR STRAW CHECKS

- A. Baled hay or straw erosion checks are temporary measures to control erosion and prevent siltation. Bales shall be either hay or straw containing 5 cubic feet or more of material.
- B. Baled hay or straw checks shall be used where the existing ground slopes toward or away from the embankment along the toe of slopes, in ditches, or other areas where siltation, erosion, or water run-off is a problem.

2.8 TEMPORARY SILT FENCES

- A. Silt fences are temporary measures utilizing woven wire or other approved material attached to posts with filter cloth composed of burlap, plastic filter fabric, etc., attached to the upstream side of the fence to retain the suspended silt particles in the run-off water.

PART 3 - EXECUTION

3.1 PROJECT REVIEW

- A. Prior to the Preconstruction Conference, meet with the Engineer and go over in detail the proposed SWP3 and the expected problem areas in regard to the erosion control work. Different solutions should be discussed so that the best method might be determined. It is the responsibility of the Contractor to submit the SWP3 to the Stark County Soil and Water Conservation District for review and approval. The written SWP3 must be signed by both the Contractor and the Owner.

3.2 PRECONSTRUCTION CONFERENCE

- A. At the Preconstruction Conference, submit for acceptance the schedule for accomplishment of temporary and permanent erosion control work as applicable for clearing and grubbing, grading, bridges and other structures at watercourses, construction, and paving. Also submit for acceptance the proposed method of erosion control on haul roads and borrow pits and the plan for disposal of waste materials. No work shall be started until the erosion control schedules and methods of operation have been accepted by the Owner.

3.3 CONSTRUCTION REQUIREMENTS

- A. The Owner has the authority to limit the surface area of erodible earth material exposed by clearing and grubbing, and the surface of erodible earth material exposed by excavation, borrow, and fill operations and to direct the Contractor to provide immediate permanent or temporary pollution control measures to prevent

contamination of adjacent streams or other watercourses, lakes, ponds, or other water impoundment. Such work may involve the construction of temporary berms, dikes, dams, sediment basins, or slope drains, and the use of temporary mulches, mats, seeding, or other control devices or methods as necessary to control erosion. Cut and fill slopes shall be seeded and mulched as the excavation proceeds to the extent directed by the Owner.

- B. Incorporate all permanent erosion control features into the project at the earliest practicable time as outlined in the accepted schedule. Temporary pollution control measures shall be used to correct conditions that develop during construction that were not foreseen during the design stage; that are needed prior to installation of permanent pollution control features; or that are needed temporarily to control erosion that develops during normal construction practices, but are not associated with permanent control features on the project.
- C. Where erosion is likely to be a problem, clearing and grubbing operations should be so scheduled and performed that grading operations and permanent erosion control features can follow immediately thereafter if the project conditions permit; otherwise, erosion control measures may be required between successive construction stages. Preconstruction vegetation ground cover shall not be destroyed, removed, or disturbed more than 20 calendar days prior to grading or earth moving unless approval is granted otherwise.
- D. The Engineer will limit the area of excavation, borrow, and embankment operations in progress commensurate with the Contractor's capability and progress to keep the finish grading, mulching, seeding, and other such permanent pollution control measures current in accordance with the accepted schedule. Should seasonal limitations make such coordination unrealistic, temporary erosion control measures shall be taken immediately to the extent feasible and justified.
- E. Under no conditions shall the amount of surface area or erodible earth material exposed at one time by excavation or fill within the project area exceed 750,000 square feet without prior approval by the Owner.
- F. The Owner may increase or decrease the amount of surface area of erodible earth material to be exposed at one time by clearing and grubbing, excavation, and borrow and fill operations as determined by his analysis of project conditions.
- G. In the event of conflict between these requirements and pollution control laws, rules, or regulations of other federal, state, or local agencies, the more restrictive laws, rules, or regulations shall apply.

3.4 CONSTRUCTION MANAGEMENT TECHNIQUES

- A. Clearing and grubbing must be held to the minimum necessary for grading and equipment operation.

- B. Construction must be sequenced to minimize the exposure time of cleared surface area.
- C. Construction must be staged or phased for large projects. Areas of one phase must be stabilized before another phase can be initiated. Stabilization shall be accomplished by temporarily or permanently protecting the disturbed soil surface from rainfall impacts and runoff.
- D. Erosion and sediment control measures must be in place and functional before earth moving operations begin, and must be constructed and maintained throughout the construction period. Temporary measures may be removed at the beginning of the work day, but must be replaced at the end of the work day.
- E. All control measures shall be checked, and repaired as necessary, weekly in dry periods and within 24 hours after any rainfall of 0.5 inch within a 24-hour period. During prolonged rainfall, daily checking and repairing is necessary. The permittee shall maintain records of checks and repairs.
- F. A specific individual shall be designated to be responsible for erosion and sediment controls on each project site.

3.5 CONSTRUCTION OF STRUCTURES

- A. Temporary Berms. A temporary berm shall be constructed of compacted soil, with a minimum width of 24 inches at the top and a minimum height of 12 inches with or without a shallow ditch, constructed at the top of fill slopes or transverse to centerline on fills. Temporary berms shall be graded so as to drain to a compacted outlet at a slope drain. The area adjacent to the temporary berm in the vicinity of the slope drain must be properly graded to enable this inlet to function efficiently and with minimum ponding in this area. All transverse berms required on the downstream side of a slope drain shall extend across the grade to the highest point at approximately a 10 degree angle with a perpendicular to centerline. The top width of these berms may be wider and the side slope flatter on transverse berms to allow equipment to pass over these berms with minimum disruptions. When practical and until final roadway elevations are approached, embankments should be constructed with a gradual slope to one side of the embankment to permit the placement of temporary berms and slope drains on only one side of the embankment.
- B. Temporary Slope Drains
 - 1. Temporary slope drains shall consist of stone gutters, fiber mats, plastic sheets, concrete or asphalt gutters, half-round pipe, metal pipe, plastic pipe, flexible rubber, or other materials which can be used as temporary measures to carry water accumulating in the cuts and on the fills down the

slopes prior to installation of permanent facilities or growth of adequate ground cover on the slopes.

2. Fiber matting and plastic sheeting shall not be used on slopes steeper than 4:1 except for short distances of 20 feet or less.
3. All temporary slope drains shall be adequately anchored to the slope to prevent disruption by the force of the water flowing in the drains. The base for temporary slope drains shall be compacted and concavely formed to channel the water or hold the slope drain in place. The inlet end shall be properly constructed to channel water into the temporary slope drain. Energy dissipaters, sediment basins, or other approved devices shall be constructed at the outlet end of the slope drains to reduce erosion downstream. An ideal dissipater would be dumped rock or a small sediment basin which would slow the water as well as pick up some sediment. All temporary slope drains shall be removed when no longer necessary and the site restored to match the surroundings.

C. Sediment Structures

1. Sediment structures shall be utilized to control sediment at the foot of embankments where slope drains outlet, at the bottom as well as in the ditchlines atop waste sites, and in the ditchlines or borrow pits. Sediment structures may be used in most drainage situations to prevent excessive siltation of pipe structures. All sediment structures shall be at least twice as long as they are wide.
2. When use of temporary sediment structures is to be discontinued, all sediment accumulation shall be removed, and all excavation backfilled and properly compacted. The existing ground shall be restored to its natural or intended condition.

D. Check Dam

1. Utilize check dams to retard stream flow and catch small sediment loads. Materials utilized to construct check dams are varied and should be clearly illustrated or explained in the Contractor's erosion control plan.
2. Key all check dams into the sides and bottom of the channel a minimum depth of 2 feet. A design is not needed for check dams but some typical designs are shown in the standard plans.
3. Do not use stone check dams where the drainage area exceeds 50 acres. Log and pole structures should generally not be used where the drainage area exceeds five acres.

- E. Temporary Seeding and Mulching. Perform seeding and mulching in accordance with Section 02485, Seeding.
- F. Brush Barriers. Brush barriers shall consist of brush, tree trimmings, shrubs, plants, and other approved refuse from the clearing and grubbing operation. The brush barriers shall be constructed approximately parallel to original ground contour. Each brush barrier shall be compressed to an approximate height of 3 to 5 feet and approximate width of 5 to 10 feet. The embankment shall not be supported by the construction of brush barriers.
- G. Baled Hay or Straw Erosion Checks. Hay or straw shall be embedded in the ground 4 to 6 inches to prevent water flowing underneath. The bales shall also be anchored securely to the ground by wooden stakes driven through the bales into the ground. Bales can remain in place until they rot, or be removed after they have served their purpose, as determined by the Engineer. Keep the checks in good condition by replacing broken or damaged bales immediately after damage occurs. Normal debris clean-out will be considered routine maintenance.
- H. Temporary Silt Fences
 - 1. Temporary silt fences shall be placed on the natural ground, at the bottom of fill slopes, in ditches, or other areas where siltation is a problem. Silt fences are constructed of wire mesh fence with a covering of burlap or some other suitable material on the upper grade side of the fence and anchored into the soil.
 - 2. Maintain the silt fence in a satisfactory condition for the duration of the project or until its removal is requested by the Engineer. The silt accumulation at the fence may be left in place and seeded, removed, etc., as directed by the Engineer. The silt fence becomes the property of the Contractor whenever the fence is removed.

3.6 MAINTENANCE

- A. The temporary erosion control features installed by the Contractor shall be acceptably maintained by the Contractor until no longer needed or permanent erosion control methods are installed. Any materials removed shall become the property of the Contractor.
- B. In the event that temporary erosion and pollution control measures are required due to the Contractor's negligence, carelessness, or failure to install permanent controls as a part of work as scheduled, and are ordered by the Engineer, such work shall be performed by the Contractor at his own expense.
- C. Where the work to be performed is not attributed to the Contractor's negligence, carelessness, or failure to install permanent controls and falls within the

specifications for a work item that has a contract price, the units of work shall be paid for at the proper contract prices.

3.7 EROSION CONTROL OUTSIDE PROJECT AREA

- A. Temporary erosion control shall include construction work outside the project area where such work is necessary as a result of construction such as borrow pit operations, haul roads, and equipment storage sites. Bid price in such cases shall include all necessary clearing and grubbing, construction incidentals, maintenance, and site restoration when no longer needed.

END OF SECTION

SECTION 02485

SEEDING

PART 1 – GENERAL

1.1 SCOPE

- A. The work covered by this section consists of furnishing all labor, equipment, and material required to place topsoil, seed, commercial fertilizer, agricultural limestone, and mulch material, including seedbed preparation, harrowing, compacting, and other placement operations on graded earthen areas as described herein and/or shown on the Drawings. In general, seeding operations shall be conducted on all newly graded earthen areas not covered by structures, pavement, or sidewalks; all cleared or grubbed areas which are to remain as finish grade surfaces; and on all existing turf areas which are disturbed by construction operations and which are to remain as finish grade surfaces. Areas disturbed by borrow activities shall also be seeded according to these Specifications.
- B. The work shall include temporary seeding operations to stabilize earthen surfaces during construction or inclement weather and to minimize stream siltation and erosion. Temporary seeding shall be performed at the times and locations directed by the Owner's Representative.

1.2 QUALITY ASSURANCE

- A. Prior to seeding operations, furnish to the Owner's Representative labels or certified laboratory reports from an accredited commercial seed laboratory or a state seed laboratory showing the analysis and germination of the seed to be furnished. Acceptance of the seed test reports shall not relieve the Contractor of any responsibility or liability for furnishing seed meeting the requirements of this section.
- B. Prior to topsoil operations, obtain representative samples and furnish soil test certificates including textural, pH, and organic ignition analysis from the State University Agricultural Extension Services or other certified testing laboratory.

1.3 MEASUREMENT AND PAYMENT

- A. Payment for this work will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the Contract. The payment for this work shall be included in the lump sum price for Seeding and Mulching.

PART 2 – PRODUCTS

2.1 TOPSOIL

- A. Place a minimum of 4 inches of topsoil over all graded earthen areas and over any other areas to be seeded. Sources of topsoil shall be approved by the Owner's Representative prior to disturbance.
- B. Topsoil shall be a friable loam containing a large amount of humus and shall be original surface soil of good, rich, uniform quality, free from any material such as hard clods, stiff clay, hardpan, partially disintegrated stone, pebbles larger than 1/2 inch in diameter, lime, cement, bricks, ashes, cinders, slag, concrete, bitumen or its residue, boards, sticks, chips, or other undesirable material harmful or unnecessary to plant growth. Topsoil shall be reasonably free from perennial weeds and perennial weed seeds, and shall not contain objectionable plant material, toxic amounts of either acid or alkaline elements, or vegetable debris undesirable or harmful to plant life.
- C. Topsoil shall be natural topsoil without admixture of subsoil material, and shall be classifiable as loam, silt loam, clay loam, sandy loam, or a combination thereof. The pH shall range from 5.5 to 7.0. Topsoil shall contain not less than 5 percent nor more than 20 percent, by weight, of organic matter as determined by loss on ignition of samples oven-dried to 65 C.

2.2 SEED

- A. Deliver seed in new bag or bags that are sound and labeled in accordance with the U.S. Department of Agriculture Federal Seed Act.
- B. All seed shall be from the last crop available at time of purchase and shall not be moldy, wet, or otherwise damaged in transit or storage.
- C. Seed shall bear the grower's analysis testing to 98 percent for purity and 90 percent for germination. At the discretion of the Owner's Representative, samples of seed may be taken for check against the grower's analysis.
- D. Species, rate of seeding, fertilization, and other requirements are shown in the Seeding Requirements Table.

2.3 FERTILIZER AND LIMING MATERIALS

- A. Fertilizer and liming materials shall comply with applicable state, local, and federal laws concerned with their production and use.

SEEDING REQUIREMENTS TABLE						
Area	Sowing Season	Species	Rates per 1,000 Square Feet			
			Seed	Fertilizer	Limestone	Maintenance ²
Flat to rolling terrain with slopes less than 3:1	3/1 to 6/1	Kentucky 31 Fescue Ladino White Clover ¹	4 lbs. 1/4 lb.	30 lbs. 6-12-12	100 lbs.	15 lbs. 10-10-10
	8/1 to 11/1	Kentucky 31 Fescue Ladino White Clover ¹ Annual Ryegrass	4 lbs. 1/4 lb. 2 lbs.	30 lbs. 6-12-12	100 lbs.	15 lbs. 10-10-10
Embankments with slopes greater than 3:1	3/1 to 6/1	Crownvetch ¹ Kentucky 31 Fescue Weeping Lovegrass	1 lb. 2 lbs. 1/4 lb.	30 lbs. 6-12-12	100 lbs.	10 lbs. 0-20-20
	8/1 to 11/1	Crownvetch ¹ Kentucky 31 Fescue Annual Ryegrass	1 lb. 2 lbs. 2 lbs.	30 lbs. 6-12-12	100 lbs.	10 lbs. 0-20-20

¹Requires inoculation.
²Maintenance fertilizer shall be applied in early spring following initial establishment of cover.

- B. Commercial fertilizer shall be a ready-mixed material and shall be equivalent to the grade or grades specified in the Seeding Requirements Table. Container bags shall be labeled with the name and address of the manufacturer, brand name, net weight, and chemical composition.
- C. Agricultural limestone shall be a pulverized limestone with a calcium carbonate content not less than 85 percent by weight. Agricultural limestone shall be crushed so that at least 85 percent of the material will pass a No. 10 mesh screen and 50 percent will pass a No. 40 mesh screen.

2.4 MULCH MATERIAL

- A. All mulch materials shall be air-dried and reasonably free of noxious weeds and weed seeds or other materials detrimental to plant growth.
- B. Mulch shall be composed of wood cellulose fiber, straw, or stalks, as specified herein. Mulch shall be suitable for spreading with standard mulch-blowing equipment.
- C. Wood cellulose fiber mulch shall be as manufactured by Weyerhaeuser Company, Conway Corporation, or equal.
- D. Straw mulch shall be partially decomposed stalks of wheat, rye, oats, or other approved grain crops.
- E. Stalks shall be the partially decomposed, shredded residue of corn, cane, sorghum, or other approved standing field crops.

2.5 MULCH BINDER

- A. Mulch on slopes exceeding a 3 to 1 ratio shall be held in place by the use of an approved erosion control fabric, such as Hold/Gro Erosion Control Fabric as manufactured by Gulf States Paper Corporation, or approved equal. Fabric

shall consist of strips of biodegradable paper interwoven with yarn that is subject to degradation by ultraviolet light.

2.6 INOCULANTS FOR LEGUMES

- A. All leguminous seed shall be inoculated prior to seeding with a standard culture of nitrogen-fixing bacteria that is adapted to the particular seed involved.

2.7 WATER

- A. Water shall be clean, clear, and free from any objectionable or harmful chemical qualities or organisms and shall be furnished by the Contractor.

PART 3 - EXECUTION

3.1 SECURING AND PLACING TOPSOIL

- A. Topsoil shall be secured from areas where topsoil has not been previously removed, either by erosion or mechanical methods. Topsoil shall not be removed to a depth in excess of the depth approved by the Owner's Representative.
- B. The area or areas from which topsoil is secured shall possess such uniformity of soil depth, color, texture, drainage, and other characteristics as to offer assurance that when removed the product will be homogeneous in nature and will conform to the requirements of these Specifications.
- C. All areas from which topsoil is to be secured shall be cleaned of all sticks, boards, stones, lime, cement, ashes, cinders, slag, concrete, bitumen or its residue, and any other refuse which will hinder or prevent growth.
- D. When securing topsoil from a designated pit or elsewhere, should strata or seams of material occur which do not come under the requirements for topsoil, such material shall be removed from the topsoil or if required by the Owner's Representative, the pit shall be abandoned.
- E. Before placing or depositing topsoil upon any area, all improvements within the area shall be completed, unless otherwise approved by the Owner's Representative.
- F. The areas in which topsoil is to be placed or incorporated shall be prepared before securing topsoil for use.

3.2 SEEDBED PREPARATION

- A. Before fertilizing and seeding, the topsoil surfaces shall be trimmed and worked to true line free from unsightly variations, bumps, ridges, and depressions, and

all detrimental material, roots, and stones larger than 3 inches in any dimension shall be removed from the soil.

- B. Not earlier than 24 hours before the seed is to be sown, the soil surface to be seeded shall be thoroughly cultivated to a depth of not less than 2 inches with a weighted disc, tiller, pulvimixer, or other equipment, until the surface is smooth and in a condition acceptable to the Owner's Representative.
- C. If the prepared surface becomes eroded as a result of rain or for any other reason, or becomes crusted before the seed is sown, the surface shall again be placed in a condition suitable for seeding.
- D. Ground preparation operations shall be performed only when the ground is in a tillable and workable condition, as determined by the Owner's Representative.

3.3 FERTILIZATION AND LIMING

- A. Following seedbed preparation, fertilizer shall be applied to all areas to be seeded so as to achieve the application rates shown in the Seeding Requirements Table.
- B. Fertilizer shall be spread evenly over the seedbed and shall be lightly harrowed, raked, or otherwise incorporated into the soil for a depth of 1/2 inch.
- C. Fertilizer need not be incorporated in the soil as specified above when mixed with seed in water and applied with power sprayer equipment. The seed shall not remain in water containing fertilizer for more than 30 minutes when a hydraulic seeder is used.
- D. Agricultural limestone shall be thoroughly mixed into the soil according to the rates in the Seeding Requirements Table. The specified rate of application of limestone may be reduced by the Owner's Representative if pH tests indicate this to be desirable. It is the responsibility of the Contractor to obtain such tests and submit the results to the Owner's Representative for adjustment in rates.
- E. It is the responsibility of the Contractor to make one application of maintenance fertilizer according to the recommendations listed in the Seeding Requirements Table.

3.4 SEEDING

- A. Seed of the specified group shall be sown as soon as preparation of the seedbed has been completed. No seed shall be sown during high winds, nor until the surface is suitable for working and is in a proper condition. Seeding shall be performed during the dates shown in the Seeding Requirements Table unless otherwise approved by the Owner's Representative. Seed mixtures may be sown together, provided they are kept in a thoroughly mixed condition during the seeding operation.

- B. Seeds shall be uniformly sown by any approved mechanical method to suit the slope and size of the areas to be seeded, preferably with a broadcast type seeder, windmill hand seeder, or approved mechanical power-drawn seed drills. Hydroseeding and hydromulching may be used on steep embankments, provided full coverage is obtained. Care shall be taken to adjust the seeder to the proper rate before seeding operations are started and to maintain the adjustment during seeding. Seed in hoppers shall be agitated to prevent segregation of the various seeds in a seeding mixture.
- C. Immediately after sowing, the seeds shall be covered and compacted to a depth of 1/8 to 3/8 inch by a cultipacker or suitable roller.
- D. Leguminous seeds shall be inoculated prior to seeding with an approved and compatible nitrogen-fixing inoculant in accordance with the manufacturer's mixing instructions.

3.5 MULCHING

- A. All seeded areas shall be uniformly mulched in a continuous blanket immediately after seeding. The mulch shall be applied so as to permit some sunlight to penetrate and air to circulate, and at the same time shade the ground, reduce erosion, and conserve soil moisture. Approximately 25 percent of the ground shall be visible through the mulch blanket.
- B. One of the following mulches shall be spread evenly over the seeded areas at the following application rates:

1.	Wood Cellulose Fiber	1,400 lbs/acre
2.	Straw	4,000 lbs/acre
3.	Stalks	4,000 lbs/acre

These rates may be adjusted at the discretion of the Owner's Representative at no additional cost to the Owner, depending on the texture and condition of the mulch material and the characteristics of the seeded area.

- C. Mulch on slopes greater than a 3 to 1 ratio shall be held in place by the use of an approved erosion control fabric. Fabric shall be installed immediately after seeding and fertilizing area (mulch shall not be used under fabric).
- D. Erosion control fabric shall be installed and applied in accordance with the manufacturer's recommendations. Any fabric which becomes torn, broken loose from securing staples, or undermined shall be immediately and satisfactorily repaired. Areas where seed is washed out before germination shall be fertilized, reseeded, and restored. Any required restoration work shall be performed without additional compensation.

3.6 WATERING

- A. Maintain the proper moisture content of the soil to ensure adequate plant growth until a satisfactory stand is obtained. If necessary, watering shall be performed to maintain an adequate water content in the soil.
- B. Watering shall be accomplished by hoses, tank truck, or sprinklers in such a way to prevent erosion, excessive runoff, and overwatered spots.

3.7 MAINTENANCE

- A. Upon completion of seeding operations, the Contractor shall clear the area of all equipment, debris, and excess material, and the premises shall be left in a neat and orderly condition.
- B. Maintain all seeded areas without additional payment until final acceptance of the work by the Owner, and any regrading, refertilizing, reliming, reseeding, or remulching shall be done at his own expense. Seeding work shall be repeated on defective areas until a satisfactory uniform stand is achieved. Damage resulting from erosion, gulleys, washouts, or other causes shall be repaired by filling with topsoil, compacting, and repeating the seeding work at his expense.

END OF SECTION

SECTION 02500

DRIVEWAYS, PARKING AREAS, AND WALKS

PART 1 – GENERAL

1.1 SUMMARY

- A. The Contractor shall provide the labor, tools, equipment, and materials necessary to construct the driveways, parking areas, and walks in accordance with the plans and as specified herein.

1.2 RELATED DOCUMENTS

- A. Drawings.
- B. Section 02200 – Earthwork
- C. ODOT Construction and Materials Specifications
- D. City of Canton Standard Drawings

1.3 QUALITY ASSURANCE

A. CODES AND REGULATORY AGENCIES

- 1. Perform all work in compliance with all applicable federal, state, and local codes and regulatory agencies.

B. STANDARDS

- 1. Material and work shall be in conformance with:
 - a. ODOT – Ohio Department of Transportation.
 - b. City of Canton Standard Drawings.

C. TESTING LABORATORY

- 1. Engage a testing laboratory acceptable to the Engineer to perform subgrade inspection and compaction tests.

1.4 SUBMITTALS

A. PRODUCT DATA

- 1. Submit Manufacturer's data on all material.

B. CERTIFICATION

1. Submit in writing certifying that all materials and mixes are in conformance with ODOT specifications.

C. TEST DATA

1. Submit test data as required under paragraph 3.1.B.1.

1.5 SITE CONDITIONS

A. COORDINATION

1. Coordinate all pavement installation with proper authorities.
2. Coordinate pavement installation with other work of Contract such that there is minimum disruption of the completed pavement and/or delays of other work.

1.6 DELIVERY, STORAGE, AND HANDLING

A. DELIVERY

1. Comply with ODOT Item 401.09.

B. STORAGE

1. Comply with ODOT Item 106.06.

C. HANDLING

1. Comply with ODOT Item 106.07.

1.7 MEASUREMENT AND PAYMENT

- A. Measurement and Payment for this work shall be by unit price and will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the Contract. The payment for this work shall be included in the unit price for Asphalt Pavement and Curb Removal and Replacement.

PART 2 – PRODUCTS

2.1 MATERIALS

A. GENERAL

1. All material shall be in accordance with ODOT "Construction and Material Specifications" except for method of payment.

B. BASES

1. Aggregate base shall meet the specifications of ODOT Item 304. The use of slag is not permitted
2. Bituminous aggregate base shall meet the specifications of ODOT Item 301.

C. PRIME COAT

1. Prime coat shall be RT-2, RT-3, MC70, or MC250 in accordance with ODOT Item 702.

D. TACK COAT

1. Tack coat shall be RC-250, RS-1, SS-1, or SS-1h in accordance with ODOT Item 702.

E. ASPHALT CONCRETE

1. Asphalt concrete surface course shall be in accordance with ODOT Item 448 Type 1.
2. Asphalt concrete intermediate course shall be in accordance with ODOT Item 448 Type 2.
3. Asphalt concrete curb shall be in accordance with ODOT Item 609.05, Type A or B.

F. CONCRETE WITH PORTLAND CEMENT

1. Concrete shall be in accordance with Section 03300 "Cast-in-Place Concrete" Class A or ODOT Item 452.

G. EXPANSION JOINT

1. Expansion joints shall be ½-inch thick premolded, nonextruding type.

H. PARKING BLOCKS

1. Parking blocks shall be Precast concrete, standard curb type, 6" x 8" x 8' with tapered edges and predrilled for anchoring. Provide three (3) ¾" x 16" hot dip galvanized steel anchor pins per unit.

PART 3 – EXECUTION

3.1 GENERAL

A. TOPSOIL

1. Topsoil shall be removed. See Section 02485 – Seeding.

B. SUBGRADE

1. Compaction. See Section 02200 – Earthwork.
2. All loose and foreign materials shall be removed and the subgrade shall be free of ruts and standing water when the base material is placed.

C. SLOPE

1. Driveways, parking areas, and walks shall be sloped to drain away from buildings and structures. Driveways in open areas shall have a center crown. Cross slope for driveways and walks shall be ¼-inch per foot unless otherwise shown.

D. EXISTING PAVEMENT

1. Driveways, parking areas, curbs and walks shall conform to the grade of existing driveways, parking areas, curbs and walks unless modifications are shown on the plans or required by the specification. Where it is necessary to disturb existing Portland cement concrete pavements, curbs or walks, the concrete shall be saw cut in neat, straight lines. The depth of saw cut shall be at least 2 inches. Where it is necessary to disturb existing asphalt concrete pavements, curbs or walks, the asphalt concrete shall be line cut with straight vertical edges by saw cutting. All cut bituminous surfaces shall be sealed with a bituminous material.

3.2 PAVEMENT

A. GENERAL

1. All construction shall be in accordance with ODOT “Construction and Material Specifications” latest edition, except for method of payment.

B. ASPHALT CONCRETE DRIVEWAYS AND PARKING AREAS

1. Aggregate base shall consist of compacted aggregate applied in layers of equal thickness to a depth shown on City of Canton Standard Drawings in accordance with ODOT Item 304.03. No layer shall exceed 6 inches in thickness after compaction. Compaction shall be in accordance with ODOT Item 304.04.
2. Prime coat shall be applied according to ODOT Item 408 at the rate of 0.40 gallon per square yard.
3. Bituminous aggregate base shall be installed in two (2) layers as shown on City of Canton Standard Drawings after compaction.
4. Unless otherwise shown, wearing surface shall consist of asphalt concrete applied in two (2) layers. The surface course shall be as shown on City of Canton Standard Drawings after compaction. The intermediate course shall be as shown on City of Canton Standard Drawings after compaction.
5. Bituminous aggregate base and asphalt pavement shall be installed in accordance with ODOT Items 301, 401, 448 Type 1, and 448 Type 2.

C. ASPHALT CONCRETE CURBS

1. Construct new asphalt concrete curbs in accordance with ODOT Specifications Item 609.05, Type A or B.
2. Asphalt concrete curbs shall match existing shape and dimensions.

3.3 CONCRETE WALKS

A. CONCRETE WALKS

1. Concrete walks shall be per City of Canton Standard Drawings.

B. FINISH

1. At a minimum, concrete shall be float finished with a tooled joint every 4 feet and an expansion joint every 20 feet.

END OF SECTION

SECTION 02534

SEWER FLOW CONTROL

PART 1 - GENERAL

1.1 WORK INCLUDED

- A. Sewer flow control may be required to conduct sewer line replacement, manhole replacement operations and all required testing effectively. In general, flow control will be required for sewer line replacement when sewer line flows are more than one-fourth (1/4) the pipe diameter. When the sewer line depth of flow at the upstream manhole in the sewer section where work is being performed is above the maximum allowable level at the time any work in the sewer is proposed, the flow shall be reduced by plugging or blocking of the flow, or by pumping and bypassing of the flow as specified. Flow control shall be coordinated with the operations of the Contractor's other crews.
- B. Sewer flow control may be required to conduct manhole rehabilitation operations and all required testing effectively. A flow through type plug may be installed inside the manhole bench while rehabilitating the existing manhole. Pumping and bypassing of the flow is also an acceptable flow control method. Flow control shall be coordinated with the operations of the Contractor's other crews.
- C. Damages to private or public property that result from sewer flow control operations are the Contractor's responsibility.

1.2 RELATED WORK

- A. Section 02560- Precast Manholes and Covers.
- B. Section 02566- Manhole Rehabilitation with a Protective Polymer Lining.

1.3 SUBMITTALS

- A. The Contractor shall submit to the Owner for review and approval his system set-up prior to implementation.

1.4 PLUGGING OR BLOCKING

- A. Insert a sewer line plug into the line at a manhole upstream from the line segment or manhole where work is to be conducted. The plug shall be designed so that a portion of the sewage flows can be released. A flow through type plug may be used while rehabilitating the existing manholes. During the inspection and testing portion of the operation, flows shall be shut off or substantially reduced so that the manhole can be properly inspected and tested.

1.5 BYPASS PUMPING

- A. When bypass pumping is required to ensure the completion of the above mentioned work items, furnish the pumping equipment, portable power generators, conduits, and all other related equipment necessary. Pumping equipment, conduits, etc., shall be of sufficient size and capacity to handle the maximum flow which can be expected in each respective sewer section in which bypass pumping equipment is installed. The pumping operation will be conducted from manhole to manhole, and no flow will be discharged on the surface or in natural waterways. All sewer rehabilitation work requiring bypass pumping will be conducted on a timely basis during normal working hours. Work will be suspended at the end of each day, sewer line flow will be returned to normal, and bypass pumping will cease.

1.6 FLOW CONTROL PRECAUTIONS

- A. When flow in a sewer line is plugged, blocked, or bypassed, sufficient precautions must be taken to protect the sewer lines from damage that may result from sewer surcharging. Further, precautions must be taken to ensure that sewer flow control operations do not cause flooding or damage to public or private property being served by the sewers involved.

1.7 PROPERTY OWNER AND OR RESIDENT NOTIFICATION

- A. The Contractor shall provide 48-hour prior written notification to all property owners and or residents that may be affected by the diversion of flow in the sewer, explaining work that is to take place and its time frame. The notification shall include approximate time when sewage cannot be received during sewer work as well as when the sewer will be available again for receiving sewage. All commercial establishments shall be provided with temporary sewer service. The means and methods shall be coordinated with the managers and the affected residents.
- B. A door hanger reminder shall be placed 24 hours prior to reducing the sanitary service.

1.8 MEASUREMENT AND PAYMENT

- A. Payment for this work will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the Contract. The payment for this work shall be included in the lump sum price for Sewer Flow Control.

END OF SECTION

SECTION 02560

PRECAST MANHOLES AND COVERS

PART 1 – GENERAL

1.1 SCOPE

- A. Contractor shall furnish all labor, materials, equipment, and incidentals required to install round precast concrete manhole sections, covers, pipe connectors, inverts, and accessories as specified herein.

1.2 REFERENCES

- A. Prestressed Concrete Institute. Manual for Quality Control for Plants and Production of Precast and Prestressed Concrete Products.
- B. National Precast Concrete Association. Quality Control Manual for Precast Concrete Plants.
- C. American Society for Testing and Materials (ASTM)
 - 1. ASTM C478 - Standard Specification for Precast Reinforced Concrete Manhole Sections.
 - 2. ASTM C890 - Standard Practice for Minimum Structural Design Loading for Monolithic or Sectional Precast Concrete Water and Wastewater Structures.
 - 3. ASTM C891 - Standard Practice for Installation of Underground Precast Concrete Utility Structures.
 - 4. ASTM C923 - Standard Specification for Resilient Connectors Between Reinforced Concrete Manhole Structures, Pipe and Laterals.
 - 5. ASTM C913 - Standard Specifications for Precast Concrete Water and Wastewater Structures.
- D. American Association of State Highway and Transportation Officials Standard Specification for Joints for Circular Concrete Sewer and Culvert Pipe Using Flexible Watertight Gaskets (AASHTO M198).
- E. American Concrete Institute Building Code Requirements for Reinforced Concrete (ACI 318).

- F. Occupational Safety and Health Administration Standard 1926.704 - Requirements for Precast Concrete.

1.3 SUBMITTALS SHALL BE AS FOLLOWS

- A. Copy of certificate or report showing that the precast concrete manufacturer conforms to Article 1.4 - Qualifications.
- B. Detail of each precast concrete section to be provided showing or charting the following:
 - 1. Manufacturer's part number or catalog number.
 - 2. Inside diameter.
 - 3. Lay length excluding base slab.
 - 4. Wall thickness and base or top thickness where applicable.
 - 5. Handling weight.
 - 6. Wire size, spacing, and area provided per vertical foot.
 - 7. Reinforcing bar size and spacing.
 - 8. Design load for flat slab or transition tops.
 - 9. Step locations.
 - 10. Concrete mix number and design strength.
 - 11. Height, width, slope, and annular space of the tongue and groove.
- C. Step detail and material specifications.
- D. Pipe connector details and material specifications.
- E. Joint material detail, material specifications and calculations showing that the joint material cross section is greater than the joint's annular space times its height.
- F. Lifting device and hole detail for lifting precast components.
- G. Submit the following at the request of the Engineer or Owner:
 - 1. Structural analysis and design calculations for flat slab top and transition top precast components, performed in accordance with applicable codes and standards, showing that allowable stresses will not be exceeded. All calculations must be sealed by a registered professional engineer.
 - 2. Calculations or test results verifying that the lifting device components and holes are designed in accordance with OSHA Standard 1926.704.
 - 3. Concrete 28-day compression strength results for every day production of precast components for the project was performed showing the required strength according to the guidelines established in ACI 318.

4. Reinforcing and cement mill reports for materials used in the manufacture of precast components for this project.
5. The above test reports for similar precast components recently produced, submitted prior to production of precast components for this project.

1.4 QUALIFICATIONS

- A. The precast Manufacturer shall comply with one (1) of the following requirements:
 1. Manufacture precast components for the project in a plant certified in the Prestressed Concrete Institute's (PCI) Plant Certification Program.
 2. Manufacture precast components for the project in a plant certified in the National Precast Concrete Association's (NPCA) Plant Certification Program.
 3. Retain an independent testing or consulting engineering firm approved by the Engineer for precast plant inspection. The basis for plant inspection shall be the National Precast Concrete Association Quality Control Manual or the Manual for Quality Control for Plants and Production of Precast and Prestressed Concrete Products. The above firm shall inspect the precast plant 2 weeks prior to and at 1 week intervals during production of materials for this project and issue a report, certified by a registered engineer that materials, methods, products, and quality control meet the requirements of the above quality control manuals.
- B. The precast Manufacturer shall have a recognized quality improvement process installed at the manufacturing facility.
- C. The precast manufacturer shall provide engineering certification as to the structural adequacy of any precast component, if requested.
- D. All concrete compressive strength testing shall be performed in a laboratory inspected by the Cement and Concrete Reference Laboratory (CCRL) of the National Bureau of Standards.

1.5 ENVIRONMENTAL REQUIREMENTS

- A. Maintain materials and surrounding air temperature to minimum 50 degrees Fahrenheit prior to, during, and 48 hours after completion of masonry, grouting or concreting work.

1.6 MEASUREMENT AND PAYMENT

- A. Payment for this work will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the Contract. The payment for this work shall be included in the lump sum price for Manhole #1 Replacement, Complete and Manhole #5 Replacement, Complete, including all hardware and accessories.

PART 2 - PRODUCTS

2.1 MATERIALS

- A. Concrete shall conform to ASTM C478 and as follows:
1. Compressive Strength: 5,000 psi minimum at 28 days.
 2. Air Content: 4 percent minimum.
 3. Alkalinity: Adequate to provide a life factor, $A_z = \text{Calcium carbonate equivalent times cover over reinforcement}$, no less than 0.35 for bases, risers and cones.
 4. Cementitious Materials: Minimum of 564 pounds per cubic yard.
 5. Coarse Aggregates: ASTM C33. Sound, crushed, angular stone only. Smooth or rounded stone shall not be used.
 6. Fine Aggregates: ASTM C33. Free from organic impurities.
 7. Chemical Admixtures: ASTM C494. Calcium chloride or admixtures containing calcium chloride shall not be used.
 8. Air Entraining Admixtures: ASTM C260.
- B. Reinforcing steel shall be ASTM A615 Grade 60 deformed bar, ASTM A82 wire or ASTM A185 welded wire fabric.
- C. Contractor shall remove and replace all pipe damaged during removal of existing manholes and installation of proposed manholes. Existing pipe to remain shall be neatly sawcut to provide a tight connection between existing and proposed pipe. Pipe shall be PVC of the size and grade shown on the drawings and meet the requirements of Technical Specification 02630.
- D. Lifting loops shall be ASTM A416 steel strand. Lifting loops made from deformed bars shall not be allowed.

- E. Flexible joint sealants shall be butyl rubber based conforming to Federal Specification SS-S-210A, AASHTO M-198, Type B butyl rubber or as follows: maximum of 1% volatile matter and suitable for application temperatures between 10 and 100 degrees Fahrenheit.
- F. Epoxy gels used for interior patching of wall penetrations shall be a 2-component, solvent-free, moisture-insensitive, high modulus, high-strength, structural epoxy paste adhesive meeting ASTM C881, Type I and II, Grade 3, Class B and C, Epoxy Resin Adhesive.

2.2 COMPONENTS

- A. Precast component fabrication and manufacture shall be as described in this paragraph and as described in the paragraphs for the specific components.
 - 1. Precast components shall be manufactured in conformance with ASTM C478. Wall and inside slab finishes resulting from casting against forms standard for the industry shall be acceptable. Exterior slab surfaces shall have a float finish. Small surface holes, normal color variations, normal form joint marks, minor depressions, chips and spalls will be tolerated. Dimensional tolerances shall be those set forth in the appropriate references and specified below.
 - 2. Joint surfaces for joints between bases, risers, and cones shall be manufactured to the joint surface design and tolerance requirements of ASTM C361. The maximum slope of the vertical surface shall be 2 degrees. The maximum annular space at the base of the joint shall be 0.10 inch. The minimum height of the joint shall be 4 inches.
 - 3. Lift holes and inserts used for handling precast components shall be sized for a precision fit with the lift devices, shall not penetrate through the manhole wall, and shall comply with OSHA Standard 1926.704.
 - 4. Step holes shall be cast or drilled in the bases, risers, and cones to provide a uniform step spacing of 16 inches. Cast step holes shall be tapered to match the taper of the steps.
- B. Precast base sections shall have the base slab cast monolithically with the walls, or have and approved galvanized or PVC waterstop cast in the cold joint between the base slab and the walls. Extended bases shall be a minimum thickness of 6 inches. The bottom step in base sections shall be a maximum of 24 inches from the high point of the bench directly below the proposed step location.
- C. The minimum lay length of precast riser sections shall be 16 inches.

- D. Precast cone sections shall have an inside diameter at the top of 24 inches. The width of the top ledge shall be no less than the wall thickness required for the cone section.
- E. Precast transition cone sections shall provide an eccentric transition from 60-inch diameter and larger manholes to 48-inch diameter risers, cones, and flat slab top sections. The minimum slope angle for the cone wall shall be 45 degrees.
- F. Precast transition top sections shall provide an eccentric transition from 60-inch and larger manholes to 48-inch-diameter risers, cones, and flat slab top sections. Transition top sections shall be furnished with vents as shown on the manhole details. The maximum amount of fill over the transition top section shall be 20 feet. Transition tops shall not be used in areas subject to vehicle traffic.
- G. Standard precast flat slab top sections shall have an inside diameter at the top of 24 inches and shall be designed for HS-20 traffic loadings as defined in ASTM C890. Items to be cast into special flat slab tops shall be sized to fit within the manhole inside diameter and the top and bottom surfaces.
- H. Precast grade rings shall be used to adjust ring and covers to finished grade. No more than 12 vertical inches of grade rings will be allowed per manhole. Grade rings shall conform to ASTM C478, City of Canton Standard Drawing No. 10 (Sheet 3 of 3, Note 6) and shall be no less than 4 inches in height.
- I. Precast inverts shall meet the following requirements:
 - 1. Pipe openings shall provide clearance for pipe projecting a minimum of 2 inches inside the manhole. The height of the transition from the pipe opening to the invert trough shall be equal to $1/2$ of the opening inside diameter minus pipe inside diameter, plus or minus $1/4$ inch. The crown of small inside diameter pipe shall be no lower than the crown of the outlet pipe. When the fall between the inlet and the outlet holes is greater than 4 inches, the inlet end of the trough shall be below the inlet pipe invert and aligned horizontally within 1 inch.
 - 2. Troughs shall be formed and finished to provide a consistent slope from the pipe outlet to the inlets up to 4-inch fall. The minimum fall shall be 1 inch. The minimum bending radius of the trough centerline is to be 1.5 times the pipe inside diameter. Provide a $1/2$ -inch radius at the intersection of 2 or more channels. The minimum concrete thickness from the bottom of the trough to the bottom of the base shall be 7 inches.
 - 3. Float finish benches to provide a uniform 4:1 slope from the high point at the manhole wall to the low point at invert trough. Provide a $1/4$ -inch radius at the edge of the bench and trough.

4. Depressions, high spots, voids, chips, or fractures over 1/4-inch in diameter or depth shall be filled with a sand cement paste and finished to a texture reasonably consistent with that of the formed surface.
- J. Provide steps in bases, risers, cones, transition cones, and transition top sections aligned vertically. All steps shall be evenly spaced with a minimum of 12 inches and maximum of 16 inches between each step. Secure steps to the wall with a compression fit in tapered holes or cast in place. Steps shall not be vibrated or driven into freshly cast concrete or grouted in place. The reinforced plastic steps shall be copolymer polypropylene plastic or equal, reinforced with a 1/2-inch diameter Grade 60 bar and have serrated tread and tall end lugs. Step pullout strength shall be a minimum of 2,000 pounds when tested according to ASTM C497.
- K. Pipe to manhole connectors shall conform to ASTM C923. On large diameter flexible pipes, provisions for control of the pipe outside diameter to within the tolerances of the connector shall be made.
- L. Joints shall be sealed internally between the tongue and the groove and additionally around the external perimeter of the joint as follows:
1. Internal seals shall consist of a plastic or paper-backed butyl rubber rope no less than 28 feet long and having a cross-sectional area no less than the annular space times the height of the joint.
 2. Internal seals may consist of an O-ring gasket conforming to ASTM C443, installed according to the precast Manufacturer's recommendation, at the option of the Contractor.
 3. Joints with a perimeter greater than or equal to 18 feet shall be internally sealed with butyl rubber/bentonite sealant.
 4. Joints with a perimeter less than 18 feet shall be internally sealed with butyl rubber sealant.
 5. External seals shall consist of a polyethylene backed flat butyl rubber sheet no less than 1/16-inch thick and 6 inches wide applied to the outside perimeter of the joint.
- M. Manhole grade rings shall conform with City of Canton Standard Detail No. 10.
- N. Manhole frames and covers shall conform with City of Canton Standard Detail No. 12.
- O. Lifting devices complying with OSHA Standard 1926.704 for handling the precast components shall be provided by the precast Manufacturer.

- P. The interior/exterior of the manhole walls shall be coated with 21 mils of coal tar epoxy, Koppers 300M or equal, where shown on the plans. The coating shall be spray applied according to the Manufacturer's recommendations. The joints between precast sections shall not be coated. Use butyl rubber rope as specified above to seal the interior horizontal joint surface.

2.3 CONFIGURATION

- A. Manholes are to be constructed as specified and as shown on the detail drawings.
- B. The number of joints shall be minimized. No more than 1 riser for each additional 5 feet in height above the base section shall be used. One additional section will be allowed for transition manholes.
- C. Where service lines enter manholes, locate them above the bench of the primary (largest diameter) sewer.

PART 3 - EXECUTION

3.1 EXAMINATION

- A. Inspect manhole components prior to unloading from the delivery truck.

3.2 DELIVERY, STORAGE, AND HANDLING

- A. Coordinate delivery with the manufacturer. Handle and store the manhole components in accordance with ASTM C891 and the Manufacturer's recommendations using methods that will prevent damage to the components and their joint surfaces.

3.3 PLACING MANHOLE SECTIONS

- A. Excavate the required depth and remove materials that are unstable or unsuitable for a good foundation. Prepare a level, compacted foundation extending 6 inches beyond the manhole base.
- B. Set base plumb and level, aligning manhole invert with pipe invert.
- C. Thoroughly clean bells and spigots to remove dirt and other foreign materials that may prevent sealing. Unroll the butyl sealant rope directly against base of spigot. Leave protective wrapper attached until sealant is entirely unrolled against spigot. Do not stretch. Overlap from side to side - not top to bottom.
- D. Set risers and cones so that steps align, taking particular care to clean, prepare and seal joints.

- E. After joining manhole sections, apply the butyl sealant sheet around the outside perimeter of the joint.
- F. Lift holes leaving less than 2 inches of wall thickness shall be plugged from the outside using a sand cement mortar. Lift holes penetrating the wall shall be additionally sealed with an interior application of an epoxy gel 1/8-inch thick extending 2 inches beyond the penetration.
- G. Sanitary manholes shall be tested according to City of Canton Supplemental Specification 04-01 (STANDARD TEST METHOD FOR CONCRETE SEWER MANHOLES BY THE NEGATIVE AIR PRESSURE TEST).
- H. Set the manhole frames to the required elevation using no more than 12 inches of grade rings per City of Canton Standard Drawing No. 10.
- I. Perform the final finishing to the manhole interior by filling all chips or fractures greater than ½-inch in length, width or depth and depressions more than ½-inch deep in inverts with a high strength grout equal to SikaSet Plug. Do not fill the joints between the precast concrete sections. Clean the interior of the manhole, removing all dirt, spills, or other foreign matter.

END OF SECTION

SECTION 02566

MANHOLE REHABILITATION WITH A PROTECTIVE POLYMER LINING

PART 1 – GENERAL

1.1 WORK INCLUDED

- A. The work under this section includes furnishing all equipment, materials, and labor required to complete each manhole rehabilitation repair type as specified herein and shown on the Drawings. All manhole rehabilitation items shall be determined in the field by the Engineer. Items may be modified at the discretion of the Engineer.
- B. All manholes specified to receive manhole rehabilitation shall be examined by the Contractor. Notify the Engineer in writing if surfaces are not acceptable. Contractor shall not begin repairs or liner application until unacceptable conditions have been corrected.
- C. The Contractor shall provide necessary sewer flow control for all manhole rehabilitation. Flow through type plugs installed in the manhole inlets and plumbed into the outlet allowing flow to pass through the structure without interference of bench and invert replacements are may be used by the Contractor. Flow through type plugs shall be removed by the Contractor at the end of each work day.
- D. Manhole rehabilitation shall consist of cleaning and preparing the surface for crack, void and leak repair, bench replacement, channel replacement, and manhole sealing with a polymer based liner material on the bench surfaces and on the walls from the bench to bottom of frame as specified herein.
- E. All work shall be in strict accordance with the Engineers specifications and recommendations including application of all products as required and in accordance with Manufacturer's directions.

1.2 QUALITY ASSURANCE

- A. The Contractor shall have suitable equipment for performing the manhole rehabilitation work and shall have demonstrated satisfactory performance in completing previous comparable work.
- B. The Contractor shall have a minimum of five (5) years experience applying and installing the products specified herein.

- C. The Contractor must certify in writing from the Manufacturer that he is approved to install the Manufacturer's products specified herein.
- D. Manufacturer Qualifications: The Manufacturer of work of this section shall have five (5) years minimum proven experience in such work and shall have satisfactorily completed three (3) jobs of similar size and type within the last five (5) years.

1.3 RELATED WORK

- A. Section 02534 – Sewer Flow Control

1.4 REFERENCES

- A. ASTM D638 - Tensile Properties of Plastics.
- B. ASTM D790 - Flexural Properties of Unreinforced and Reinforced Plastics.
- C. ASTM D695 - Compressive Properties of Rigid Plastics.
- D. ASTM D4541 - Pull-off Strength of Coatings Using Portable Adhesion Testers.
- E. ASTM D7234 - Pull-off Adhesion Strength of Coatings on Concrete Using Portable Adhesion Testers.
- F. ASTM D2584 - Volatile Matter Content.
- G. ASTM D2240 - Durometer Hardness, Type D.
- H. ASTM D543 - Resistance of Plastics to Chemical Reagents.
- I. ASTM C109 - Compressive Strength Hydraulic Cement Mortars.
- J. ACI 506.2-77 - Specifications for Materials, Proportioning, and Application of Shotcrete.
- K. ASTM C579 - Compressive Strength of Chemically Setting Silicate and Silica Chemical Resistant Mortars.
- L. ASTM - The published standards of the American Society for Testing and Materials, West Conshohocken, PA.
- M. NACE - The published standards of National Association of Corrosion Engineers (NACE International), Houston, TX.

- N. SSPC - The published standards of the Society of Protective Coatings, Pittsburgh, PA.
- O. Los Angeles County Sanitation District – Evaluation of Protective Coatings for Concrete.
- P. ASTM F1216 (Including Appendix XI): Design Parameters for Buried Structures (structural rehabilitation) utilizing the External Buckling Equation for thickness determination.
- Q. ASTM D2990: Test Methods for Tensile, Compressive and Flexural Creep and Creep Rupture in Plastics
- R. SSPWC 210-2.3.3 - Chemical resistance testing published in the Standard Specifications for Public Works Construction, 1997 edition (otherwise known as “The Greenbook”).

1.5 SUBMITTALS

A. SHOP DRAWINGS AND ENGINEERING DATA

1. Submit complete shop drawings and Engineering data to the Engineer in accordance with the requirements of Supplemental Specifications. Submit Manufacturer’s literature, design data, samples, and warranty with the submittal. Manufacturer’s literature shall include material specifications, product safety sheets (MSDS sheets) and application instructions for the material to be used for the manhole rehabilitation work.
2. Wall thickness design calculations for each manhole to be rehabilitated utilizing the specified resin technology systems must be submitted, along with supporting formulas that document that version of formula used. Additionally, product specific strength values, including the short term flexural modulus and the long term flexural modulus strength, must be substantiated by third party testing which will be submitted. The materials utilized for the contracted project shall be of a quality equal to or better than the materials used in the long term test with respect to the initial flexural modulus and the long term reduction factor used in design.
3. Submit certification that the equipment to be used for applying the products has been manufactured or approved by the protective coating manufacturer and applicator personnel have been trained and certified for proper use of the equipment.

1.6 STORAGE AND PROTECTION

- A. Deliver materials in original sealed containers with seals unbroken and labels legible and intact, as applicable. Materials shall be delivered in sufficient quantities so as not to cause delay in the work. Materials shall be stored in accordance with the Manufacturer's instruction.

1.7 GUARANTEE

- A. Provide a guarantee against defects and workmanship in accordance with the requirements of the General Specifications.

1.8 DESIGN CONDITIONS

- A. The following design conditions shall be assumed for all structures being rehabilitated with the approved resin system:

Parameter	Design Requirement
1. Structure Condition	Partially Deteriorated, based on condition of the existing structure.
2. Soil Type	Saturated
3. Design Thickness	ASTM 1216-Appendix. XI
4. Ovality	Not greater than 5%
5. Soil Load	120 lbs/cu. ft.
6. Traffic Load	AASHTO-HS-20-44 Highway
7. Soil Modulus	>500 psi.<1000 psi.
8. Safety Factor	2.0
9. Soil Cover	Distance from grade to invert of pipe.
10. Water Table	Same as Soil Cover unless changed by Owner or Owner's Representative.

1.9 MEASUREMENT AND PAYMENT

- A. Payment for this work will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the Contract. The payment for this work shall be included in the lump sum price for Manhole Rehabilitation, Complete.

PART 2 – PRODUCTS

2.1 MANHOLE SEALING PRODUCTS

A. REPAIR MATERIAL

1. Standard Portland cement or new concrete (not quick setting high strength cement) must be well cured prior to application of the protective coating. Generally, 28 days is adequate cure time for standard Portland cement. If earlier application is desired, compressive or tensile strength of the concrete can be tested to determine if acceptable cure has occurred. (Note: Bond strength of the coating to the concrete surface is generally limited to the tensile strength of the concrete itself. Engineer may require Elcometer pull tests to determine suitability of concrete for coating.
2. Cementitious patching and repair materials should not be used unless their manufacturer provides information as to its suitability and procedures for topcoating with the approved coating. Project specific submittals should be provided including application, cure time and surface preparation procedures which permit optimum bond strength with the approved coating.
3. Repair materials shall be used to fill voids, structurally reinforce and/or rebuild surfaces, etc. as determined necessary by the protective coating applicator. Repair materials must be compatible with the specified coating and shall be applied in accordance with the manufacturer's recommendations.
4. The following products may be accepted and approved as compatible repair basecoat materials for approved topcoating for use within the specifications:
 - a. 100% solids, solvent-free grout specifically formulated for approved topcoating compatibility. The grout manufacturer shall provide instructions for trowel or spray application and for approved topcoating procedures.
 - b. Factory blended, rapid setting, high early strength, non-shrink repair mortar that can be troweled or pneumatically spray applied may be approved if specifically formulated to be suitable for approved topcoating. Such repair mortars should not be used unless their manufacturer provides information as to its suitability for topcoating with the approved topcoating. Project specific submittals should be provided including application, cure time and surface preparation procedures which permit optimum bond strength with the approved coating.
 - c. In the case of excessive infiltration, a hydraulic cement or plug may be used to stop the flow of the infiltration. Manufacturer's include

Strong, Sika, Preco or approved equal. The hydraulic cement shall be compatible with the spray applied resin coating.

B. PROTECTIVE LINING MATERIAL

1. Manufacturer: The protective lining material shall be SprayWall® as manufactured by Sprayroq, Inc., SpectraShield as manufactured by CCI Spectrum, Inc or approved equal.
2. The resin based material shall be used to form the sprayed structurally enhanced monolithic liner covering all interior surfaces of the structure, including benches and inverts of manholes. The physical requirements must be verified by an independent, certified, third party testing laboratory within the last five years and must be submitted with the shop drawings.

SprayWall lining shall conform to the following minimum properties:

Compressive strength	ASTM D 695	18,000 psi
Tensile strength	ASTM D 638	>7,450 psi
Bond	Substrate Failure	
Flexural Modulus (initial)	ASTM D 790	> 735,000 psi
Flexural Modulus (long term)	ASTM D2990-01	> 520,000 psi
Density	87 ± pcf	
Chemical Resistance:	Severe Municipal Sewer: All types of service	

SpectraShield lining shall conform to the following minimum properties:

Compressive strength	ASTM D 1621	90-150 psi
Tensile strength	ASTM D 638	>3,600 psi
Tear strength	ASTM D 624	550 pli
Bond	Substrate Failure	
Flexural Modulus (100%)	> 2,400 psi	
Hardness (Shore D)	ASTM D2240	45

Density 4-10 pcf

Chemical Resistance: Severe Municipal Sewer: All types of service

3. When the wall of the resin based liner is to be structurally designed to withstand the hydraulic load generated by the groundwater table the long term (50yr) value of the flexural modulus of elasticity will be utilized to calculate the thickness of the structural liner. The initial flexural modulus of elasticity (short term) of the submitted resin material will be utilized with the long term deformation percentage as determined by ASTM D2990 (see below) in the design equation outlined in ASTM 1216-07b, Appendix X1. The value of the long term flexural modulus of the proposed product will be certified by an independent, certified, third party testing lab, independent of the Manufacturer and submitted with the bid package. The definition of long term value will be identified as initial flexural modulus of elasticity less the reduction in value caused by Creep over a fifty (50) year minimum period and verified by third party DMA testing (ASTM D2990). All design submittals will include this certified third party DMA testing (ASTM D2990) value in their respective design calculations for each structure being rehabilitated.
4. Unless dictated by the Owner or the Owner's Representative, the finished corrosion repair will include the entire structure, including the bottom and any invert areas of the structure. The entire repaired structure will be repaired with the same material over the entire area of the structure.

C. PROTECTIVE LINING APPLICATION REQUIREMENTS

1. SprayWall® liner as manufactured by Sprayroq, Inc., shall have a minimum thickness of 250 mils.
2. SpectraShield liner as manufactured by CCI Spectrum, Inc shall have a minimum thickness of 500 mils.

D. PROTECTIVE LINING APPLICATION EQUIPMENT

1. Manufacturer approved heated plural component spray equipment shall be used in the application of the specified protective lining.

2.2 BENCH AND CHANNEL REPLACEMENT

- A. Concrete shall conform to the following ASTM standards: C-33; C-94; C-150; and C-494. Concrete shall have a 28 day cure strength of 4,500 psi and be resistant to weathering and abrasion.

2.3 WATER

- A. Water used to mix product shall be clean and potable and provided by the Contractor. Questionable water shall be tested by a laboratory per ASTM C-94 procedure.

PART 3 – EXECUTION

3.1 SEWER MANHOLE CLEANING

- A. Sewer manhole cleaning shall be performed as necessary to perform rehabilitation items as specified. It is recognized that there are some conditions such as deteriorated walls and major blockages that prevent cleaning from being accomplished or where additional damage would result if cleaning were attempted or continued. Should such conditions be encountered, the Contractor shall immediately notify the Engineer, who will decide whether to proceed with cleaning.

B. Cleaning Precautions

1. During manhole cleaning operations, satisfactory precaution shall be taken in the use of cleaning equipment. When hydraulic cleaning tools (which depend upon water pressure to provide their cleaning force) are used, precautions shall be taken to ensure that the water pressure created does not damage the manhole or cause flooding of public or private property being served by the sewer.
2. Any foreign material, including sludge, mud, sand, gravel, rocks, bricks, grease, and other debris shall be removed from the manhole. The removal of debris shall be completed before any flushing of the manhole occurs. All debris shall be completely removed and not allowed to enter the sewer pipe. After the debris is completely removed, the manhole walls, invert and bench surfaces shall be flushed using a high velocity water gun (minimum 5,000 psi water spray), to complete the cleaning. Verification of the cleaning work will be by visual inspection by the Engineer.
3. If all deposits have not been removed from the manhole, a 10% solution of muriatic acid will be applied by spraying from above the manhole. Manholes treated with acid solution shall be thoroughly flushed and the manhole allowed to dry. The mixing, application, and removal of the acid

solution shall be in strict accordance with the Manufacturers' specifications and recommendations. All safety procedures and protective devices applicable to the handling of the acid will be strictly adhered to.

4. Remove existing coatings prior to application of the new protective coating. Applicator is to maintain strict adherence to applicable NACE and SSPC recommendations with regard to proper surface preparation and compatibility with existing coatings.
5. All existing manhole steps within the manholes shall be removed or cut off flush with the wall surface.

3.2 MATERIAL REMOVAL

- A. Debris such as sludge, rocks, grease, and other solid or semisolid material resulting from the cleaning operation shall be removed at the manhole being cleaned by the use of vacuum or other suitable equipment. Passing material from sewer section to sewer section shall not be permitted. Placement of a temporary dam in the downstream manhole exit may be necessary to prevent debris from washing downstream.

3.3 DISPOSAL OF MATERIALS

- A. All solids or semisolids resulting from the cleaning operations shall be removed from the site and disposed of offsite. No additional payment shall be made for the removal and offsite disposal of materials resulting from cleaning operations.

3.4 ENVIRONMENTAL CONDITIONS

- A. When freezing temperatures are expected, the Contractor shall take measures to keep applied materials warm and provide the required heat in the manhole before repair work is started and the 24 hour period following application. No application shall be made if ambient temperature is below 40 degrees Fahrenheit. No application shall be made to frozen surfaces or if freezing is expected to occur within the substrate within 24 hours after application. Precautions shall be taken to keep the temperatures at time of application below 90 degree Fahrenheit. Water temperature shall not exceed 80 degrees Fahrenheit. Chill with ice if necessary.

3.5 SURFACE PREPARATION

- A. Each manhole shall be cleaned prior to the start of sealing operation, as described in Section 3.1 of this specification. The invert shall be covered during construction operations to prevent loose, extraneous materials from collecting in the invert and entering sewer lines. All loose, unsound, and protruding brick, mortar and concrete shall be removed. Before application of each material,

surfaces to be sprayed or coated will be inspected by the Owner or Owner's representative.

- B. Applicator shall inspect all surfaces specified to receive a protective coating prior to surface preparation. Applicator shall notify Owner of any noticeable disparity in the surfaces which may interfere with the proper preparation or application of the repair mortar and protective coating.
- C. All contaminants including: oils, grease, incompatible existing coatings, waxes, form release, curing compounds, efflorescence, sealers, salts, or other contaminants shall be removed.
- D. All concrete or mortar that is not sound or has been damaged by chemical exposure shall be removed to a sound concrete surface or replaced.
- E. Surface preparation method(s) should be based upon the conditions of the substrate, service environment and the requirements of the resin protective coating to be applied.
- F. Surfaces to receive protective coating shall be cleaned and abraded to produce a sound surface with adequate profile and porosity to provide a strong bond between the protective coating and the substrate. Generally, this can be achieved with a high pressure water cleaning using equipment capable of 5,000 psi at 4 gpm. Other methods such as high pressure water jetting (refer to NACE Standard No. 5/SSPC-SP12), abrasive blasting, shotblasting, grinding, scarifying or acid etching may also be used. Detergent water cleaning and hot water blasting may be necessary to remove oils, grease or other hydrocarbon residues from the concrete. Whichever method(s) are used, they shall be performed in a manner that provides a uniform, sound clean neutralized surface that is not excessively damaged.
- G. Infiltration shall be stopped by using a material which is compatible with the specified repair mortar and is suitable for topcoating with the specified protective coating. Flows should be totally plugged and/or diverted when coating the invert. All extraneous flows into the manhole at or above the area coated shall be plugged and/or diverted until the coating has set hard to the touch. As an option, hot air may be added to the manhole to accelerate set time of the coating.
- H. The area between the manhole and the manhole ring and any other area that might exhibit movement or cracking due to expansion and contraction, shall be grouted with a flexible grout or gel.
- I. Installation of the protective coating shall not commence until the concrete substrate has properly cured in accordance with these specifications.

- J. Temperature of the surface to be coated should be maintained between 50 degrees F and 120 degrees F during application. Prior to and during application, care should be taken to avoid exposure of direct sunlight or other intense heat source to the structure being coated. Where varying surface temperatures do exist, care should be taken to apply the coating when the temperature is falling versus rising (ie. late afternoon into evening vs. morning into afternoon).

3.6 APPLICATION OF REPAIR MATERIALS

- A. If using approved cementitious repair materials, such shall be troweled to provide a smooth surface with an average profile equivalent to coarse sandpaper to optimally receive the protective coating. No bugholes or honeycomb surfaces should remain after the final trowel procedure of the repair mortar.
- B. The repair materials shall be permitted to cure according to manufacturer recommendations. Curing compounds should not be used unless approved for compatibility with the specified protective coating.
- C. Application of the repair materials, if not performed by the coating certified applicator, should be inspected by the protective coating certified applicator to ensure proper finishing for suitability to receive the specified coating.
- D. After abrasive blast and leak repair is performed, all surfaces shall be inspected for remaining laitance prior to protective coating application. Any evidence of remaining contamination or laitance shall be removed by additional abrasive blast, shotblast or other approved method. If repair materials are used, refer to these specifications for surface preparation. Areas to be coated must also be prepared in accordance with these specifications after receiving a cementitious repair mortar and prior to application of the approved coating.
- E. All surfaces should be inspected during and after preparation and before the protective coating is applied.

3.7 VOID REPAIR

- A. Patching of manhole walls shall be required in areas where large voids exist (greater than 2 inches in depth) including missing bricks, cracks, spalls in manhole walls, around steps, frames, pipes and mortar joints. All cracked or disintegrated material shall be removed from the area to be patched exposing a clean, sound substrate. Patching material shall be used as specified and water plug type materials shall not be used for general patching. Missing bricks shall be replaced by a qualified mason.

3.8 ACTIVE LEAK REPAIR

- A. Wall repair shall include the sealing of all visible leaks in the manhole with infiltration control material as specified. Weep holes shall be installed as required to localize infiltration during application of patching material or infiltration control material. Weep holes shall be plugged after material application with infiltration control material prior to application of protective coating material. Wherever heavy infiltration is present due to high ground water and cannot be reasonably stopped, 5/8" diameter holes will be drilled at intervals around the base of the manhole wall to relieve outside pressure. All pressure leaks shall be sealed with a rapid setting pressure grout that bonds both mechanically and chemically to saturated surfaces. Once the walls have been rehabilitated, the drilled holes shall be plugged as specified in Section 2.1 A of this specification.

3.9 BENCH AND CHANNEL REPLACEMENT

- A. Manholes will require bench and/or channel removal and replacement as indicated on the Drawings.
- B. Forming new manhole inverts shall provide a smooth, straight, and uniform flow line from the invert of the inlet pipe(s) to the invert of the outlet pipe. Where laterals are present, the system shall provide for a sanitary sweep into the main flow line.
- C. New concrete shall be placed to a minimum 2 inch thickness, over solid existing concrete base properly prepared as specified for manhole walls. Where solid concrete does not remain after preparation, new concrete shall be poured to a minimum 4 inch thickness. The new bench shall be tapered up to the manhole wall at a minimum slope of 4:1.
- D. Channel repair shall include patching of the invert, bench areas and sewer lines in the manholes using patching material in accordance with the Manufacturer's recommendations. The flow channel shall be checked for leaks, cracks, spalls or other discrepancies by plugging the upstream side and visually inspecting the channel. Repairs to the channel shall be made after the flow has been blocked and the invert cleaned. The patching material shall be uniformly troweled onto the damaged channel at a minimum thickness of ½ inch at the invert. Material shall be extended out onto bench of manhole to sufficiently tie into liner material. Repairs made to the channel shall create a smooth surface and provide for smooth flow through the manhole. Flow shall be established after a minimum of 30 minutes after application of patching material. All loose and deteriorated material shall be removed from the work site and properly disposed of by the Contractor.

3.10 APPLICATION OF PROTECTIVE LINING MATERIAL

- A. Application procedures shall conform to the recommendations of the protective coating manufacturer, including material handling, mixing, environmental controls during application, safety, and spray equipment.
- B. The spray equipment shall be specifically designed to accurately ratio and apply the specified protective coating materials and shall be regularly maintained and in proper working order.
- C. The protective coating material must be spray applied by a Certified Applicator of the protective coating manufacturer.
- D. Specified surfaces shall be coated by spray application of a solvent-free, 100% solids, polyurethane structural lining or 100% solids, silicone modified polyurea as further described herein.
- E. Airless spray application equipment approved by the coating manufacturer shall be used to apply each coat of the protective coating.
- F. If necessary, subsequent topcoating or additional coats of the protective coating should occur as soon as the basecoat becomes tack free, no later than the recoat window for the specified products. Additional surface preparation procedures will be required if this recoat window is exceeded.

3.11 CURING

- A. Liner product shall be cured for a minimum of 1 hour before releasing sanitary sewer flows.
- B. After final application of the liner product, traffic shall be withheld 4 to 6 hours.

3.12 PRODUCT TESTING

- A. High Voltage Spark Test. After the protective coating has set hard to the touch it shall be inspected by the Contractor and witnessed by the Owner with high-voltage holiday detection equipment. This test is critical when applied to corrosion protection applications (i.e. mil coatings less than 250 mils). Surface shall first be dried, an induced holiday shall then be made on to the coated concrete or metal surface and shall serve to determine the minimum/maximum voltage to be used to test the coating for holidays at that particular area. The spark tester shall be initially set at 100 volts per 1 mil (25 microns) of film thickness applied but may be adjusted as necessary to detect the induced holiday (refer to NACE RPO188-99). All detected holidays shall be marked and repaired by abrading the coating surface with grit disk paper or other hand tooling method. After abrading and cleaning, additional protective coating material can be hand applied to the repair area. All touch-up/repair procedures shall follow the protective coating manufacturer's recommendations.

- B. Adhesion Testing. The adhesion tests shall be performed by the Contractor on a minimum of one or 10% of all rehabilitated structures, which ever is greater, or as shown on the Plan and/or specified in the Special Provisions. Adhesion testing shall be conducted after the lining or coating system has cured per manufacturer instruction and in accordance with ASTM D4541 or ASTM 7234 as modified herein. Adhesion is critical for proper performance of a corrosion barrier (i.e. < 250 mils). A minimum of one 20 mm dolly shall be affixed to the lined surface of the structure at the upper section or cone area, mid section and at the bottom, unless otherwise specified in the Special Provisions. Each testing location shall be identified by the Owner. The adhesive used to attach the dollies to the liner shall be rapid setting with tensile strength in excess of the liner material and permitted to cure in accordance with manufacturer recommendations. The lining material and dollies shall be adequately prepared to receive the adhesive. Prior to pull test, the Contractor shall utilize a scoring device to cut through the coating until the substrate is reached. Extreme care shall be required while scoring to prevent micro cracking in the coating, since cracks may cause failures at diminished strengths. Failure due to improper dolly adhesive or scoring shall require retesting. The pull tests in each area shall meet or exceed 200 psi. and shall include subbase adhered to the back of the dolly or no visual signs of coating material in the test hole. Pull tests with results between a minimum 150 psi and 200 psi shall be acceptable if more than 50% of the subsurface is adhered to the back of the dolly. A test result can be discarded, as determined by the Owner, if there is a valid nonstatistical reason for discarding the test results as directed by Sections 8.4 and 8.5 of ASTM D4541 and ASTM 7234. If any test fails, a minimum of three additional locations in the section of the failure shall be tested, as directed by the Owner. If any of the retests fail, all loosely adhered or unadhered liner in the failed area, as determined by the Owner shall be removed and replaced at the Contractor's expense.

NOTE: The mil thickness will be measured and confirmed with the scored and pulled test samples. In structural repairs (partially or fully deteriorated design assumptions), it is critical to confirm the design thickness with the pulled sample as adhesion is not assumed in the ASTM 1216 design. The primary purpose of the pull test in structural rehabilitation is to confirm applied thickness, not adhesion. Any derived adhesion is further enhancement to the final installation strength of the rehabilitated structure.

3.13 QUALITY CONTROL TESTING

- A. Once all manholes have been sealed and the proper curing time for the waterproofing materials has elapsed, the manholes shall be visually inspected by viewing from street level for the elimination of infiltration by the Contractor in the presence of the Owner. The inspection shall be performed at the discretion of the Owner during the warranty period following rainfall sufficient to raise the

ground water table above the problem areas. All leakage problems determined by this inspection shall be corrected by the Contractor within an agreed upon time, to the satisfaction of the Owner, at no additional cost.

END OF SECTION

SECTION 02630

POLYVINYL CHLORIDE PIPE

PART 1 - GENERAL

1.1 WORK INCLUDED

- A. The Contractor shall furnish all labor, materials, equipment and accessories required to assemble, install, test, and place into satisfactory service, the PVC piping as specified herein and shown on the Drawings.

1.2 RELATED WORK

- A. Section 02200 - Earthwork.

1.3 SYSTEM DESCRIPTION

- A. PVC piping shall be installed for gravity sewer mains in the locations as shown on the Drawings.

1.4 QUALITY ASSURANCE

- A. The Contractor shall be responsible for ensuring that all equipment installed is properly connected to other related equipment for proper functioning of the system.

1.5 SUBMITTALS

A. SHOP DRAWINGS AND ENGINEERING DATA

- 1. Submit complete shop drawings and engineering data to the Owner's Representative in accordance with the requirements of the Supplemental Specifications.

1.6 STORAGE AND PROTECTION

- A. Store and protect the PVC pipe in accordance with the Manufacturer's recommendations.

1.7 GUARANTEE

- A. Provide a guarantee against defective products and workmanship.

1.8 MEASUREMENT AND PAYMENT

- A. Measurement and Payment for this work shall be by unit price and will include all equipment, materials and labor necessary to perform the work under this specification as shown on the Drawings and specified herein and included in the

Contract. The payment for this work shall be included in the unit price for 8-inch diameter PVC SDR 35 Sanitary Sewer Removal and Replacement.

PART 2 - PRODUCTS

2.1 MATERIALS

- A. Pipe shall meet the requirements of ASTM D 2241 "Standard Specification for Polyvinyl Chloride (PVC) Plastic Pipe (SDR-PR)", class as shown on the Drawings; or AWWA C900, class as shown on the Drawings.
- B. Gasket shall be ASTM F 477, "Standard Specification for Elastomeric Seals (Gaskets) for Joining Plastic Pipe." Gaskets for pipe 6 inch and larger shall be supplied with retainer rings.
- C. Push-on joint shall meet ASTM D 3139, "Standard Specification for Joints for Plastic Pressure Pipe Using Flexible Elastomeric Seals."
- D. PVC material shall be 12454-B (PVC 1120) as defined in ASTM D 1784, "Standard Specification for Rigid Polyvinyl Chloride (PVC) Compounds and Chlorinated Polyvinyl Chloride (CPC) Compounds."

PART 3 - EXECUTION

3.1 EXISTING UTILITIES

- A. Carefully protect from damage at all times all existing sewers, water lines, gas lines, underground conduits, telephone lines, sidewalks, curbs, gutters, pavements, electric lines, or other utilities or structures in the vicinity of the work. Where it is necessary for the proper accomplishment of the work to repair, remove and/or replace any such utility, the work shall be done under the provisions set forth by the affected utility owner.
- B. Sewers to be installed parallel to any existing or proposed water main shall be laid at least 10 feet, horizontally, from the water main. If conditions prevent the 10-foot separation, the sewer may be constructed closer to a water main if it is laid in a separate trench and if the bottom of the water main is at least 18 inches above the top of the sewer.
- C. When sewers cross under water mains, the top of the sewer shall be at least 18 inches below the bottom of the water main. If necessary, the water main shall be relocated to provide this separation or reconstructed with mechanical-joint ductile iron pipe for a distance of 10 feet on each side of the sewer. One full length of water main shall be centered over the sewer so that both joints will be as far from the sewer as possible.
- D. When it is impossible to obtain proper horizontal and vertical separation as stipulated above, both water main and sewer shall be constructed of mechanical-joint ductile iron pipe and shall be pressure tested to assure water tightness.

3.2 INSTALLATION

- A. Alignment and Grade. All pipe shall be laid to, and maintained at, the established lines and grades. The Contractor may set line and grade for the sewer by using a laser beam coaxially through the sewer being laid.
- B. Trench Construction
1. Stockpiling Excavated Material: All excavated material shall be stockpiled in a manner that will not endanger the work or obstruct sidewalks and driveways. Hydrants under pressure, valve-pit covers, valve boxes, curb-stop boxes, fire and police call boxes, and other utility controls shall be kept accessible.
 2. Dewatering: Where conditions are such that running or standing water occurs in the trench bottom or the soil in the trench bottom displays a "quick" tendency, the water shall be removed by pumps and other suitable means (such as well points or pervious underdrain bedding) until the pipe has been installed and the backfill has been placed to a sufficient height to prevent flotation of pipe. Generally, a depth of backfill over the top of the pipe equal to 1-1/2 pipe diameters is sufficient to prevent flotation.
 3. Preparation of Trench Bottom: The trench bottom shall be constructed to provide a firm, stable, and uniform support for the full length of the pipe. Bell holes shall be provided at each joint to permit proper assembly and pipe support. Any part of the trench bottom excavated below grade shall be backfilled to grade and shall be compacted as required to provide firm pipe support. When an unstable subgrade condition is encountered that could provide inadequate pipe support, additional trench depth shall be excavated and refilled with suitable foundation material. Ledge rock, boulders, and large stones shall be removed to provide 6 inches of cushion on all sides of the pipe and accessories.
 4. Laying of Pipe: To prevent damage, proper implements, tools, and equipment shall be used for placement of the pipe in the trench. Under no circumstances shall pipe or accessories be dropped into the trench. All foreign matter or dirt shall be removed from the pipe interior. Pipe joints shall be assembled with care. When pipe laying is not in progress, open ends of installed pipe shall be closed to prevent entrance of trench water, dirt, foreign matter, or small animals into the pipeline.
 5. Pipe Embedment: PVC pipe shall be installed with crushed stone (less than 3/4-inch diameter or washed No. 67 stone) or sand bedding providing uniform longitudinal support under the pipe. Backfill material shall be worked under the sides of the pipe to provide satisfactory haunching. Initial backfill material shall be crushed stone and shall be placed to a minimum depth of 12 inches over the top of the pipe as shown on the Drawings. All pipe embedment material shall be selected and placed carefully. Sharp stones and crushed rock (larger than 3/4-inch) which could cause significant scratching or abrasion of the pipe, shall be

excluded from the embedment material. Bedding and initial backfill shall be compacted to a minimum of 90 percent standard Proctor.

6. Final Backfill: After placement and compaction of pipe embedment materials and initial backfill, the balance of backfill materials may be machined placed. The material shall contain no large stones or rocks, frozen material or debris. Proper compaction procedures shall be exercised to provide required 90 percent density, standard Proctor. See Section 02200, Earthwork, for backfill requirements in streets, roads, drives, and alleys.

END OF SECTION

SECTION 03300

CAST-IN-PLACE CONCRETE

PART 1 - GENERAL

1.1 WORK INCLUDED

- A. This section specifies cast-in-place concrete, including formwork, reinforcing, mix design, placement procedures, and finishes.

1.2 RELATED DOCUMENTS

- A. Drawings and general provisions of Contract, including General and Supplemental Conditions or General Provisions and Division 1 specification sections, apply to this section.

1.3 QUALITY ASSURANCE

- A. Codes and Standards. Comply with provisions of following codes, specifications, and standards, except where more stringent requirements are shown or specified:
 - 1. ACI 318, "Building Code Requirements for Reinforced Concrete."
 - 2. Concrete Reinforcing Steel Institute (CRSI), "Manual of Standard Practice."
- B. Concrete Testing. The Owner will engage an independent testing laboratory to conduct testing of materials and concrete to ensure compliance with this Specification.
- C. Materials and installed work may require testing and retesting at any time during progress of work. Tests, including retesting, of rejected materials or installed work that fails its initial testing, shall be done at Contractor's expense.

1.4 SUBMITTALS

A. SHOP DRAWINGS AND ENGINEERING DATA

- 1. Complete shop drawings and engineering data shall be submitted to the Owner's Representative in accordance with the requirements of the Supplemental Specifications.
- 2. Product data for proprietary materials and items, including reinforcement and forming accessories, admixtures, patching

compounds, waterstops, joint systems, curing compounds, and others as requested by the Owner's Representative.

3. Shop drawings for reinforcement, describing the fabrication, bending, and placement of concrete reinforcement. Comply with ACI SP-66 (88), "ACI Detailing Manual," showing bar schedules, stirrup spacing, diagrams of bent bars, and arrangement of concrete reinforcement. Include special reinforcement required for openings through concrete structures. Splices, clearances, and tolerances shall comply with ACI 318 requirements.
4. Shop drawings for formwork, prepared by a registered professional engineer, for fabrication and erection of forms for suspended slabs, beams, and other elevated concrete elements.
 - a. Owner's Representative's review is for general design compliance only. Design of formwork for structural stability and efficiency is Contractor's responsibility.
5. Laboratory test reports for concrete materials and mix design test.
6. Materials certificates for the items listed below. Materials certificates shall be signed by manufacturer and Contractor, certifying that each material item complies with or exceeds specified requirements. Provide certification for admixture manufacturers that chloride content complies with specification requirements.
 - a. Aggregates.
 - b. Cement.
 - c. Admixtures.
 - d. Reinforcement (including welds).
 - e. Curing compounds.
 - f. Waterstops.
 - g. Bonding compounds.

1.5 GUARANTEE

- A. The Contractor shall provide a guarantee against defective equipment and workmanship in accordance with the requirements of the General Specifications.

1.6 MEASUREMENT AND PAYMENT

- A. No separate measurement or payment will be allowed for this work. Payment for all work performed under this section shall be included in other items of work.

PART 2 - PRODUCTS

2.1 FORM MATERIALS

- A. Forms for Exposed Finish Concrete. Plywood, metal, metal-framed plywood-faced, or other acceptable panel-type materials, to provide continuous, straight, smooth, exposed surfaces. Furnish in largest practicable sizes to minimize number of joints and to conform to joint system shown on Drawings.
 - 1. Use overlaid plywood complying with U.S. Product Standard PS-1 "A- C or B-B High Density Overlaid Concrete Form," Class 1.
 - 2. Plywood complying with U.S. Product Standard PS-1 "B-B (Concrete Form) Plywood," Class 1, Exterior Grade or better, mill-oiled and edge-sealed, with each piece bearing legible inspection trademark.
- B. Forms for Unexposed Finish Concrete. Plywood, lumber, metal, or other acceptable material. Provide lumber dressed on at least two edges and one side for tight fit.
- C. Forms for Cylindrical Columns and Supports. Metal, fiberglass-reinforced plastic, or paper or fiber tubes. Provide paper or fiber tubes of laminated plies with water-resistant adhesive and wax-impregnated exterior for weather and moisture protection. Provide units with sufficient wall thickness to resist wet concrete loads without deformation.
- D. Form Coatings. Provide commercial formulation form-coating compounds with a maximum VOC of 350 mg/l that will not bond with, stain, or adversely affect concrete surfaces and will not impair subsequent treatments of concrete surfaces.
- E. Form Ties. Factory-fabricated, adjustable-length, removable or snap-off metal form ties, designed to prevent form deflection and to prevent spalling concrete upon removal. Provide units that will leave no metal closer than 1-1/2 inches to exposed surface. Provide ties that, when removed, will leave holes not larger than 1 inch diameter in concrete surface.

2.2 REINFORCING MATERIALS

- A. Reinforcing Bars. ASTM A 615, Grade 60, deformed unless noted otherwise.
- B. Steel Wire. ASTM A 82, plain, cold-drawn steel.
- C. Welded Wire Fabric. ASTM A 185, welded steel wire fabric.

- D. Supports for Reinforcement. Bolsters, chairs, spacers, and other devices for spacing, supporting, and fastening reinforcing bars and welded wire fabric in place. Use wire-bar-type or plastic supports complying with CRSI specifications.
 - 1. For slabs-on-grade, use supports with sand plates or horizontal runners where base material will not support chair legs.
 - 2. For exposed-to-view concrete surfaces, where legs of supports are in contact with forms, provide supports with legs that are plastic protected (CRSI, Class 1) or stainless steel protected (CRSI, Class 2).
 - 3. Bricks or similar objects will not be allowed for use as reinforcement supports.

2.3 CONCRETE MATERIALS

- A. Portland Cement. ASTM C 150, Type I.
 - 1. Use one brand of cement throughout project unless otherwise acceptable to the Owner's Representative.
- B. Fly Ash. ASTM C 618, Type C or Type F.
- C. Normal Weight Coarse Aggregate. ASTM C 33, Class Designation 3S, Grading Size No. 57, and as herein specified. Provide coarse aggregate from a single source for all exposed concrete.
- D. Normal Weight Fine Aggregate. Natural siliceous river sand, consisting of hard, clean, sharp, strong, durable, and uncoated particles, conforming to the requirements of ASTM C 33.

Fine aggregate shall have a fineness modulus of 2.40 minimum and 3.00 maximum and the material passing the No. 200 sieve shall not exceed 3.0 percent by weight of the total sample. Coal and lignite shall not exceed 0.5 percent by weight of the total sample for all concrete. The fineness modulus of fine aggregate incorporated in the work shall not vary more than 0.10 plus or minus from the fineness modulus of the fine aggregate in the appropriate preliminary mix design approved by the Owner's Representative.

- E. Water: Drinkable.
- F. Admixtures, General. Provide admixtures for concrete that contain not more than 0.1 percent chloride ions.
 - 1. Available Manufacturers: Provide admixtures from single source manufacturer for air entrainment and water reducing admixtures.

Manufacturers of admixtures shall include but not be limited to the following, provided single source availability requirements are met:

- a. Master Builders, Inc.
 - b. W. R. Grace and Company.
 - c. Euclid Chemical Company.
2. Air-Entraining Admixture. ASTM C 260, certified by manufacturer to be compatible with other required admixtures.
 3. Water-Reducing Admixture: ASTM C 494, Type A.
 4. High-Range Water-Reducing Admixture (Super Plasticizer). ASTM C 494, Type F or Type G.
 5. Water-Reducing, Accelerating Admixture. ASTM C 494, Type E. Accelerating admixtures must be nonchloride type and are for use only when specifically authorized by the Owner's Representative. Submittal of separate mix design using accelerating admixture will be required.
 6. Water-Reducing, Retarding Admixture. ASTM C 494, Type D. Retarding admixtures must be nonchloride type and are for use only when specifically authorized by the Owner's Representative. Submittal of separate mix design using retarding admixture will be required.

2.4 RELATED MATERIALS

- A. Waterstops. Provide waterstops at construction joints and other joints as indicated on the Drawings.
 1. Polyvinyl Chloride Waterstops. Corps of Engineers CRD-C 572.
 - a. Available Manufacturers: Subject to compliance with requirements, manufacturers offering products that may be incorporated in the work include, but are not limited to, the following:
 - 1) The Burke Company.
 - 2) Greenstreak Plastic Products Company.
 - 3) W. R. Meadows, Inc.
 - 4) Vinylex Corp.
 - b. PVC water stops shall be ribbed with a minimum nominal width of 6 inches and a minimum nominal thickness of 3/16 inches. Control joints shall utilize dumbbell type water stop.

2. Bentonite Clay Waterstops. Specially formulated joint sealant, manufactured in coils with a rectangular cross section, which swells upon contact with water. Adhesive supplied by the water stop manufacturer shall be used to secure the waterstop to existing concrete prior to placing adjoining concrete.
 - a. Available Products: Subject to compliance with requirements, products that may be incorporated in the work include, but are not limited to, "Waterstop-RX," American Colloid Company.
- B. Granular Base. Evenly-graded mixture of fine and coarse aggregates to provide, when compacted, a smooth and even surface below slabs on grade.
- C. Sand Cushion. Clean, manufactured or natural sand.
- D. Vapor Barrier. Multi-ply lamination of polyethylene film and glass scrim reinforced paper to form a moisture, scuff, and puncture-resistant membrane. Moisture permeance shall not exceed 0.10 perms in accordance with ASTM E 96, Procedure A.
 1. Available Products: Subject to compliance with requirements, products that may be incorporated in the work include, but are not limited to, the following:
 - a. "Moistop," St. Regis Paper Company.
 - b. "Plybar," Glas-Kraft.
- E. Liquid Membrane-Forming Curing Compound. Liquid-type membrane- forming curing compound with fugitive dye complying with ASTM C 309, Type I-D, Class A. Moisture loss not more than 0.055 gr./sq. cm. when applied at 200 sq. ft./gal.
 1. Available Products: Subject to compliance with requirements, manufacturers whose products may be incorporated in the work include, but are not limited to, the following:
 - a. Dayton Superior Corp.
 - b. Euclid Chemical Co.
 - c. Sonneborn-Rexnord.
- F. Epoxy Bonding Agent. ASTM C 881, two-component material suitable for use on dry or damp surfaces. Provide material "Type," "Grade," and "Class" to suit project requirements.
 1. Available Products: Subject to compliance with requirements, products that may be incorporated in the work include, but are not limited to, the following:

- a. "Burke Epoxy M.V.," The Burke Company.
 - b. "Euco Epoxy System #452 or #620," Euclid Chemical Co.
 - c. "Sikadur 32 Hi-Mod," Sika Corporation.
- G. Chemical Hardener. U.S. Army Corps of Engineers Specification 204, liquid hardener composed of magnesium and zinc fluorosilicates combined with an anionic surfactant to improve wetting penetration. Hardener to be colorless, nontoxic, nonflammable, and compatible with and providing good adhesion for subsequent topping and/or coatings. Install hardener in accordance with manufacturer's recommendations on interior concrete floors of shops, garages, vehicle service areas, and elsewhere as indicated on the Drawings.
- 1. Available Products: Subject to compliance with requirements, products that may be incorporated in the work include, but are not limited to, the following:
 - a. "Lapidolith," Sonneborn.
- H. Joint Filler. At joints in slabs and elsewhere as indicated on the Drawings, use preformed strips of asphalt saturated fiberboard (½-inch nominal thickness) complying with ASTM D 1751.
- I. Epoxy Grout. Epoxy grout for installing rubber form tie plugs shall be as follows:
- 1. Sikadur 32 Hi-Mod, Sika Corporation.

2.5 PROPORTIONING AND DESIGN OF MIXES

- A. Prepare design mixes for each type and strength of concrete by either laboratory trial batch or field experience methods as specified in ACI 301. If trial batch method used, use an independent testing facility acceptable to the Owner's Representative for preparing and reporting proposed mix designs. The testing facility shall not be the same as used for field quality control testing.
- 1. Fly ash may be substituted for cement in amounts not to exceed 20 percent of the specified cement content by weight providing that the mix conforms with all other requirements.
- B. Submit written reports to the Owner's Representative of each proposed mix for each class of concrete at least 15 days prior to start of concrete placement. Do not begin concrete production until proposed mix designs have been reviewed by the Owner's Representative.

C. Design mixes to provide normal weight concrete with the following properties:

Property	Concrete Class	
	A	B
28-day Compressive Strength:		
Average of Three Consecutive Specimens	4,000 psi	2,500 psi
Minimum Any One Specimen	3,200 psi	2,000 psi
Minimum Cement Content (sacks/cubic yard)	6.5	5.0
Maximum Water-to-Cement Ratio:		
By Weight (pound/pound)	0.49	0.54
By Sack (gallon/sack)	5.5	6.0
Air Content (percent by volume):		
Minimum	4.5	4.5
Maximum	5.5	5.5
Ratio of Coarse to Fine Aggregate (by weight):		
Minimum	1.0	1.0
Maximum	2.0	2.5

Class "A" concrete shall be used for all concrete work unless Class "B" is specifically called for on the Drawings.

D. Adjustment to Concrete Mixes. Mix design adjustments may be requested by Contractor when characteristics of materials, job conditions, weather, test results, or other circumstances warrant, as accepted by the Owner's Representative. Laboratory test data for revised mix design and strength results must be submitted to and accepted by the Owner's Representative before using in work.

2.6 ADMIXTURES

- A. Use water-reducing admixture or high-range water-reducing admixture (Superplasticizer) in all concrete.
- B. Use nonchloride accelerating admixture in concrete placed at ambient temperatures below 50°F (10°C) when authorized by the Owner's Representative.
- C. Use high-range water reducing admixture (HRWR) in pumped concrete.
- D. Admixtures. Use admixtures for water reduction and set control in strict compliance with manufacturer's directions.

2.7 SLUMP LIMITS

A. Proportion and design mixes to result in concrete slump at point of placement as follows:

1. Ramps, slabs, and sloping surfaces: Not more than 3 inches.
2. Walls and Columns: 3 to 4 inches.
3. Floors and slabs: 3 to 4 inches.
4. Beams: 3 to 4 inches.
5. Blocks and Footings: 2 to 4 inches.

Concrete having a slump greater than 1 inch over the specified maximum shall be rejected.

B. Pumped Concrete. The maximum slump of the concrete at the suction of the pump may be increased above the maximum slumps specified in 2.7 A. by the addition of high range water reducing agent at the jobsite in accordance with the manufacturer's recommendations. The adjustment to the slump shall be only that required to overcome the slump loss in the pumping equipment. In no circumstance shall the slump exceed 6 inches at the suction or discharge of the pump.

C. Congested Placement. When specifically requested in writing by the Contractor and approved by the Owner's Representative, increases in discharge slumps may be considered in placements that include congested areas of reinforcement or areas otherwise deemed to be difficult to place concrete and achieve necessary consolidation. The increases in slump, if approved, shall be achieved by the addition of high range water reducing agent at the site in accordance with the manufacturer's instructions. The request shall include the proposed amount of slump increase and the amount of high range water reducer to be added. The Owner's Representative will evaluate each request independently.

2.8 CONCRETE MIXING

A. Job-Site Mixing. Only allowed when specifically authorized by the Owner's Representative.

B. Ready-Mix Concrete. Comply with requirements of ASTM C 94, and as specified.

1. When air temperature is between 85°F (30°C) and 90°F (32°C), reduce mixing and delivery time from 1-1/2 hours to 75 minutes, and when air temperature is above 90°F (32°C), reduce mixing and delivery time to 60 minutes.

2.9 EPOXY ANCHORS AND DOWELS

- A. Anchors. Unless shown otherwise, dowels or anchors placed in existing or hardened concrete shall be stainless steel Type 316 ASTM F 593 and ASTM F 594, threaded rod with hex nuts.
- B. Epoxy adhesive shall be as follows:
 - 1. Two component, 100% solid (containing no solvents), non-sag paste, insensitive to moisture, gray in color.
 - 2. Conform to NSF Standard 61 for use in conjunction with drinking water systems.
 - 3. Conform to ASTM C 881-90; Type IV; Grade 3; Class A, B, and C with the exception of gel time.
 - 4. Maximum shrinkage during cure per ASTM D 2566 of 0.00051 in./in.
 - 5. Compressive strength, ASTM D 695: 10,300 psi minimum.
 - 6. Shelf life: 3 years minimum.
 - 7. Water solubility: None.
 - 8. Heat deflection temperature, ASTM D648: 140°F minimum.
 - 9. Epoxy adhesive shall be Epcon C-6, manufactured by ITW Ramset.

PART 3 - EXECUTION

3.1 GENERAL

- A. Coordinate the installation of joint materials and vapor barriers with placement of forms and reinforcing steel.

3.2 FORMS

- A. General. Design, erect, support, brace, and maintain formwork to support vertical and lateral, static and dynamic loads that might be applied until concrete structure can support such loads. Construct formwork so concrete members and structures are of correct size, shape, alignment, elevation, and position. Maintain formwork construction tolerances complying with ACI 347.

- B. Construct forms to sizes, shapes, lines, and dimensions shown and to obtain accurate alignment, location, grades, level, and plumb work in finished structures. Provide for openings, offsets, sinkages, keyways, recesses, moldings, rustications, reglets, chamfers, blocking, screeds, bulkheads, anchorages and inserts, and other features required in work. Use selected materials to obtain required finishes. Solidly butt joints and provide backup at joints to prevent leakage of cement paste.
- C. Fabricate forms for easy removal without hammering or prying against concrete surfaces. Provide crush plates or wrecking plates where stripping may damage cast concrete surfaces. Provide top forms for inclined surfaces where slope is too steep to place concrete with bottom forms only. Kerf wood inserts for forming keyways, reglets, recesses, and the like, for easy removal.
- D. Provide temporary openings where interior area of formwork is inaccessible for cleanout, for inspection before concrete placement, and for placement of concrete. Securely brace temporary openings and set tightly to forms to prevent loss of concrete mortar. Locate temporary openings in forms at inconspicuous locations.
- E. Chamfer exposed corners and edges at 3/4 inch unless indicated otherwise on the Drawings, using wood, metal, PVC, or rubber chamfer strips fabricated to produce uniform smooth lines and tight edge joints.
- F. Provisions for Other Trades. Provide openings in concrete formwork to accommodate work of other trades. Determine size and location of openings, recesses, and chases from trades providing such items. Accurately place and securely support items built into forms.
- G. Cleaning and Tightening. Thoroughly clean forms and adjacent surfaces to receive concrete. Remove chips, wood, sawdust, dirt, or other debris just before concrete is placed. Retighten forms and bracing before concrete placement as required to prevent mortar leaks and maintain proper alignment.

3.3 VAPOR BARRIER INSTALLATION

- A. General. Following leveling and tamping of granular base for slabs on grade, place vapor barrier sheeting with longest dimension parallel with direction of pour.
- B. Lap joints 6 inches and seal vapor barrier joints with manufacturers' recommended mastic and pressure-sensitive tape.

- A. General. Comply with ACI 318 and the CRSI's recommended practice for "Placing Reinforcing Bars," for details and methods of reinforcement placement and supports and as herein specified.
 - 1. Avoiding cutting or puncturing vapor retarder during reinforcement placement and concreting operations.
 - 2. Field bending of reinforcement using heat and/or welding of reinforcement is NOT permitted.
- B. Clean reinforcement of loose rust and mill scale, earth, ice, and other materials that reduce or destroy bond with concrete.
- C. Accurately position, support, and secure reinforcement against displacement. Locate and support reinforcing by metal chairs, runners, bolsters, spacers, and hangers, as approved by the Owner's Representative.
- D. Place reinforcement to obtain at least minimum coverage for concrete protection. Arrange, space, and securely tie bars and bar supports to hold reinforcement in position during concrete placement operations. Set wire ties so ends are directed into concrete, not toward exposed concrete surfaces.
 - 1. All bars on face of concrete cast against earth shall have 3 inches clear cover.
 - 2. All bars on face of concrete exposed or otherwise not cast against earth shall have clear cover as follows:
 - a. Bars No. 5 and smaller shall have 1.5 inches clear cover.
 - b. Bars No. 6 and larger shall have 2 inches clear cover.
- E. Install welded wire fabric in as long lengths as practicable. Lap adjoining pieces at least one full mesh and lace splices with wire. Offset laps of adjoining widths to prevent continuous laps in either direction.
- F. Install dowels into existing concrete using EPCON C-6 ceramic epoxy as indicated on the Drawings and conforming to the provisions of this section.

3.5 JOINTS

- A. Construction and Control Joints. Locate and install construction and control joints as indicated or, if not indicated, locate so as not to impair strength and appearance of the structure, as acceptable to the Owner's Representative.
1. Provide keyways at least 1-1/2 inches deep with a width of approximately one-half the thickness of the thinnest section being joined at construction and control joints in walls, slabs, between walls and slabs, and between walls and footings unless otherwise indicated. Acceptable bulkheads designed for this purpose may be used for slabs.
 2. Place construction and control joints perpendicular to main reinforcement. Continue reinforcement across construction joints except as otherwise indicated. Do not continue reinforcement through sides of strip placements or at control joints.
 3. Use bonding agent on existing concrete surfaces that will be joined with fresh concrete at construction joints.
 4. Wall and Structural Slab Construction Joints. Provide construction joints in walls and structural slabs as indicated or as specified herein if not indicated. Construction joints shall be placed in walls and structural slabs at intervals indicated on the Drawings or at intervals not exceeding 48 feet in any direction if not indicated on the Drawing unless authorized by the Owner's Representative.
- B. Waterstops. Provide waterstops in construction and control joints as indicated. Install waterstops to form continuous diaphragm in each joint in strict accordance with manufacturer's instructions. Make provisions to support and protect exposed waterstops during progress of work. Field-fabricate joints in waterstops in accordance with manufacturer's printed instructions.
- C. Isolation Joints in Slabs-on-Ground for Floors of Buildings, Sidewalks, and Driveways. Construct isolation joints in slabs-on-ground at points of contact between slabs-on-ground and vertical surfaces, such as column pedestals, foundation walls, grade beams, and elsewhere as indicated. Construct isolation joints using preformed joint filler board.
- D. Contraction Joints in Slabs-on-Ground for Floors of Buildings, Sidewalks, and Driveways. Construct contraction joints in slabs-on-ground to form panels of patterns as shown. Use saw cuts 1/8 inch wide by 1/4 of slab depth or inserts 1/4 inch wide by 1/4 of slab depth, unless otherwise indicated.
1. Form contraction joints by inserting premolded plastic, hardboard, or fiberboard strip into fresh concrete until top surface of strip is flush with

slab surface. Tool slab edges round on each side of insert. After concrete has cured, remove inserts and clean groove of loose debris.

2. Begin saw cutting of contraction joints in floor slabs as soon as possible after slab finishing as may be safely done without dislodging aggregate. Saw cutting must be completed within 8 hours following slab placement.
3. If joint pattern is not shown, provide joints not exceeding 15 feet in either direction and locate to conform to bay spacing wherever possible (at column centerlines, half bays, third bays).

3.6 INSTALLATION OF EMBEDDED ITEMS

- A. General. Set and build into work anchorage devices and other embedded items required for other work that is attached to or supported by cast-in-place concrete. Use setting drawings, diagrams, instructions, and directions provided by suppliers of items to be attached thereto.
- B. Forms for Slabs. Set edge forms, bulkheads, and intermediate screed strips for slabs to obtain required elevations and contours in finished surfaces. Provide and secure units to support screed strips using strike-off templates or compacting-type screeds.

3.7 PREPARATION OF FORM SURFACES

- A. General. Coat contact surfaces of forms with an approved, nonresidual, low-VOC, form-coating compound before reinforcement is placed.
- B. Do not allow excess form-coating material to accumulate in forms or to come into contact with in-place concrete surfaces against which fresh concrete will be placed. Apply in compliance with manufacturer's instructions.
- C. Coat steel forms with a nonstaining, rust-preventative material. Rust-stained steel formwork is not acceptable.

3.8 CONCRETE PLACEMENT

- A. Inspection. Before placing concrete, inspect and complete formwork installation, reinforcing steel, and items to be embedded or cast in. Notify other crafts to permit installation of their work; cooperate with other trades in setting such work.
- B. General. Comply with ACI 304, "Recommended Practice for Measuring, Mixing, Transporting, and Placing Concrete," and as herein specified.
- C. Deposit concrete continuously or in layers of such thickness that no concrete will be placed on concrete that has hardened sufficiently to cause the formation of

seams or planes of weakness. If a section cannot be placed continuously, provide construction joints as herein specified. Deposit concrete to avoid segregation at its final location.

- D. Placing Concrete in Forms. Deposit concrete in forms in horizontal layers not deeper than 24 inches and in a manner to avoid inclined construction joints. Where placement consists of several layers, place each layer while preceding layer is still plastic to avoid cold joints.
1. Consolidate placed concrete by mechanical vibrating equipment supplemented by hand-spading, rodding, or tamping. Use equipment and procedures for consolidation of concrete in accordance with ACI 309.
 2. One operable, back-up, mechanical vibrator shall be on site prior to beginning concrete placement.
 3. Do not use vibrators to transport concrete inside forms. Insert and withdraw vibrators vertically at uniformly spaced locations not farther than visible effectiveness of machine. Place vibrators to rapidly penetrate placed layer and at least 6 inches into preceding layer. Do not insert vibrators into lower layers of concrete that have begun to set. At each insertion, limit duration of vibration to time necessary to consolidate concrete and complete embedment of reinforcement and other embedded items without causing segregation of mix.
- E. Placing Concrete Slabs. Deposit and consolidate concrete slabs in a continuous operation, within limits of construction joints, until the placing of a panel or section is completed.
1. Consolidate concrete during placing operations so that concrete is thoroughly worked around reinforcement and other embedded items and into corners.
 2. Bring slab surfaces to correct level with straightedge and strike off. Use bull floats or darbies to smooth surface, free of humps or hollows. Do not disturb slab surfaces prior to beginning finishing operations.
 3. Maintain reinforcing in proper position during concrete placement.
- F. Cold-Weather Placing. If permitted by the Owner's Representative, comply with provisions of ACI 306 and as follows. Protect concrete work from physical damage or reduced strength that could be caused by frost, freezing actions, or low temperatures.
1. When air temperature has fallen or is expected to fall below 40°F (4 C), uniformly heat water and aggregates before mixing to obtain a concrete

mixture temperature of not less than 50°F (10°C) and not more than 80°F (27°C) at point of placement.

3. Do not use frozen materials or materials containing ice or snow. Do not place concrete on frozen subgrade or on subgrade containing frozen materials.
 4. Do not place concrete on or against any formwork that has an accumulation of ice or snow. Remove ice or snow by manual means and by melting with heat. Do not melt snow or ice by the application of melting agents or chemicals.
 5. Do not use calcium chloride, salt, and other materials containing antifreeze agents or chemical accelerators unless authorized by the Owner's Representative.
 6. Provide adequate means for maintaining the temperature of the air surrounding the concrete at 70°F for three days, or 50°F for five days, or for as long as is necessary to ensure proper curing of the concrete. Rapid cooling of the concrete shall be prevented. Housing, covering, or other protection used in connection with heating shall remain in place and intact at least 24 hours after the artificial heat is discontinued.
- G. Hot-Weather Placing. When hot weather conditions exist that would seriously impair quality and strength of concrete, place concrete in compliance with ACI 305 and as herein specified.
1. Cool ingredients before mixing to maintain concrete temperature at time of placement below 85°F. Mixing water may be chilled, or chopped ice may be used to control temperature provided water equivalent of ice is calculated to total amount of mixing water. Use of liquid nitrogen to cool concrete is Contractor's option.
 2. Cover reinforcing steel with water-soaked burlap if it becomes too hot, so that steel temperature will not exceed the ambient air temperature immediately before embedment in concrete.
 3. Fog spray forms, reinforcing steel, and subgrade just before concrete is placed.
 4. Use water-reducing retarding admixture when required by high temperatures, low humidity, or other adverse placing conditions, when acceptable to the Owner's Representative.

3.9 FINISH OF FORMED SURFACES

- A. Coordinate finish requirements with surface preparation requirements for concrete to be coated in accordance with Section 09900, Painting.
- B. Provide rough form finish for formed concrete surfaces not exposed to view in the finish work or concealed by other construction. This is the concrete surface having texture imparted by form-facing material, with tie holes and defective areas repaired and patched and fins and other projections exceeding 1/4-inch in height rubbed down or chipped off.
- C. Provide smooth form finish for formed concrete surfaces exposed to view or to be covered with a coating material applied directly to concrete, or a covering material applied directly to concrete, such as waterproofing, dampproofing, veneer plaster, painting, or other similar system. This is an as-cast concrete surface obtained with selected form-facing material, arranged in an orderly and symmetrical manner with a minimum of seams. Repair and patch defective areas with fins and other projections completely removed and smoothed.
- D. Grout-Cleaned Finish. Provide grout-cleaned finish as follows to concrete surfaces that have received smooth form finish treatment not to be coated with paint, waterproofing, dampproofing, or other similar system.
 - 1. Combine one part portland cement to 1-1/2 parts fine sand by volume, and a 50:50 mixture of acrylic-based bonding admixture and water to consistency of thick paint. Blend standard portland cement and white portland cement, amounts determined by trial patches, so that final color of dry grout will match adjacent surfaces.
 - 2. Thoroughly wet concrete surfaces, apply grout to coat surfaces, and fill small holes. Remove excess grout by scraping and rubbing with clean burlap. Keep damp by fog spray for at least 36 hours after rubbing.
- E. Related Unformed Surfaces. At tops of walls, horizontal offsets, and similar unformed surfaces occurring adjacent to formed surfaces, strike-off smooth and finish with a texture matching adjacent formed surfaces. Continue final surface treatment of formed surfaces uniformly across adjacent unformed surfaces unless otherwise indicated.

3.10 MONOLITHIC SLAB FINISHES

- A. Coordinate finish requirements with surface preparation requirements for concrete to be coated in accordance with Section 09900, Painting.
- B. Float Finish. Apply float finish to monolithic slab surfaces to receive trowel finish and other finishes as hereinafter specified; slab surfaces to be covered with

membrane or elastic waterproofing, membrane or elastic roofing, or sand-bed terrazzo; and as otherwise indicated.

1. After screeding, consolidating, and leveling concrete slabs, do not work surface until ready for floating. Begin floating, using float blades or float shoes only, when surface water has disappeared, when concrete has stiffened sufficiently to permit operation of power-driven floats, or both. Consolidate surface with power-driven floats or by hand-floating if area is small or inaccessible to power units. Check and level surface plane to a tolerance of plus or minus 1/4-inch as measured from a 10-foot straight edge. Cut down high spots and fill low spots. Uniformly slope surfaces to drains. Immediately after leveling, refloat surface to a uniform, smooth, granular texture.
- C. Trowel Finish. Apply trowel finish to monolithic slab surfaces to be exposed to view and slab surfaces to be covered with resilient flooring, carpet, ceramic or quarry tile, paint, or other thin film finish coating system.
- D. Trowel and Fine Broom Finish. Where ceramic or quarry tile is to be installed with thin-set mortar, apply trowel finish as specified, then immediately follow with slightly scarifying surface by fine brooming.
- E. Nonslip Broom Finish. Apply nonslip broom finish to exterior concrete platforms, steps, and ramps, and elsewhere as indicated.
1. Immediately after float finishing, slightly roughen concrete surface by brooming with fiber-bristle broom perpendicular to main traffic route. Coordinate required final finish with the Owner's Representative before application.

3.11 CONCRETE CURING AND PROTECTION

- A. General. Protect freshly placed concrete from premature drying and excessive cold or hot temperatures. In hot, dry, and windy weather, protect concrete from rapid moisture loss before and during finishing operations with an evaporation-control material. Apply in accordance with manufacturer's instructions after screeding and bull floating, but before power floating and troweling.
- B. Initial Curing. Start initial curing as soon as free water has disappeared from concrete surface after placing and finishing.
- C. Curing Methods. Perform curing of concrete by curing and sealing compound, by moist curing, by moisture-retaining cover curing, and by combinations thereof, as herein specified. Select curing method appropriate for subsequent coating and finishing requirements. Coordinate curing methods with Section 09900, Painting, for concrete to be painted.

1. Provide moisture curing by either of the following methods or combination thereof, maintaining concrete surface moisture for seven days:
 - a. Keep concrete surface continuously wet by covering with water.
 - b. Use continuous water-fog spray.
 - c. Cover concrete surface with specified absorptive cover, thoroughly saturate cover with water, and keep continuously wet. Place absorptive cover to provide coverage of concrete surfaces and edges, with 4-inch lap over adjacent absorptive covers.
2. Moisture-Cover Curing: Cover concrete surfaces with moisture-retaining cover for curing concrete, placed in widest practicable width with sides and ends lapped at least 3 inches and sealed by waterproof tape or adhesive. Immediately repair any holes or tears during curing period using cover material and waterproof tape. Maintain concrete surface moisture for seven days.
3. Curing and sealing compound, when utilized, shall be applied as follows:
 - a. Flatwork: Apply curing and sealing compound to concrete slabs as soon as final finishing operations are complete (within 2 hours and after surface water sheen has disappeared). Apply uniformly in continuous operation by power spray or roller in accordance with manufacturer's directions. Recoat areas subjected to heavy rainfall within 3 hours after initial application. Maintain continuity of coating and repair damage during curing period.
 - b. Use membrane curing compounds that will not affect surfaces to be covered with finish materials applied directly to concrete.
 - c. Formed Surfaces: Apply curing and sealing compound upon removal of form work.
4. Curing Formed Surfaces. Cure formed concrete surfaces, including underside of beams, supported slabs, and other similar surfaces, by moist curing with forms in place for full curing period or until forms are removed. If forms are removed, continue curing by methods specified above, as applicable.
5. Curing Unformed Surfaces. Cure unformed surfaces, such as slabs, floor topping, and other flat surfaces, by application of appropriate curing method.

- a. Cure concrete surfaces to receive liquid floor hardener or other finish by use of moisture-retaining cover, unless otherwise directed.

3.12 REMOVAL OF FORMS

- A. General. Formwork not supporting weight of concrete, such as sides of beams, walls, columns, and similar parts of the work, may be removed after cumulatively curing at not less than 50°F (10°C) for 72 hours after placing concrete, provided curing and protection operations are maintained.
- B. Formwork supporting weight of concrete, such as beams, soffits, joists, slabs, and other structural elements, may not be removed in less than 14 days and until concrete has attained at least 75 percent of design minimum compressive strength at 28 days. Determine potential compressive strength of in-place concrete by testing field-cured specimens representative of concrete location or members.
- C. Form-facing material may be removed 4 days after placement only if shores and other vertical supports have been arranged to permit removal of form-facing material without loosening or disturbing shores and supports.

3.13 REUSE OF FORMS

- A. Clean and repair surfaces of forms to be reused in work. Split, frayed, delaminated, or otherwise damaged form-facing material will not be acceptable for exposed surfaces. Apply new form-coating compound as specified for new formwork.
- B. When forms are extended for successive concrete placement, thoroughly clean surfaces, remove fins and laitance, and tighten forms to close joints. Align and secure joint to avoid offsets. Do not use "patched" forms for exposed concrete surfaces except as acceptable to the Owner's Representative.

3.14 MISCELLANEOUS CONCRETE ITEMS

- A. Filling In. Fill in holes and openings left in concrete structures for passage of work by other trades, unless otherwise shown or directed, after work of other trades is in place. Mix, place, and cure concrete as herein specified, to blend with in-place construction. Provide other miscellaneous concrete filling shown or required to complete work.
- B. Curbs. Provide monolithic finish to interior curbs by stripping forms while concrete is still green and steel-troweling surfaces to a hard, dense finish with corners, intersections, and terminations slightly rounded.

- C. Equipment Bases and Foundations. Provide machine and equipment bases and foundations, as shown on Drawings. Set anchor bolts for machines and equipment to template at correct elevations, complying with certified diagrams or templates of manufacturer furnishing machines and equipment. Anchor bolts set into existing concrete shall utilize EPCON C-6 ceramic epoxy.
- D. Reinforced Masonry. Provide concrete grout for reinforced masonry lintels and bond beams where indicated on Drawings and as scheduled. Maintain accurate location of reinforcing steel during concrete placement.
- E. Concrete Embedment and Encasement of Pipe. Install concrete for embedment and encasement where indicated on the Drawings and at such locations where installation conditions require such pipe support as determined by the Owner's Representative. Embedment and encasement of pipe shall be preceded by the following preliminary steps:
 - 1. Remove all loose material from the trench prior to placing concrete. All concrete shall have a continuous contact with undisturbed soil on sides and bottom of trench.
 - 2. Accurately place a base course of concrete to such grade and elevation that the pipe will be at specified grade when pipe bells are supported on, and in contact with, the top surface of the base course.
 - 3. Restrain each length of pipe to maintain alignment and prevent floatation in a manner acceptable to the Owner's Representative.

3.15 CONCRETE SURFACE REPAIRS

- A. Patching Defective Areas. Repair and patch defective areas with cement mortar immediately after removal of forms, when acceptable to the Owner's Representative.
 - 1. Cut out honeycomb, rock pockets, voids over 1/4-inch in any dimension, and holes left by tie rods and bolts, down to solid concrete but in no case to a depth of less than 1-inch. Make edges of cuts perpendicular to the concrete surface. Thoroughly clean, dampen with water, and brush-coat the area to be patched with specified bonding agent. Place patching mortar before bonding compound has dried.
 - 2. For exposed-to-view surfaces, blend white portland cement and standard portland cement so that, when dry, patching mortar will match color surrounding. Provide test areas at inconspicuous location to verify mixture and color match before proceeding with patching. Compact mortar in place and strike-off slightly higher than surrounding surface.

- B. Repair of Formed Surfaces. Remove and replace concrete having defective surfaces if defects cannot be repaired to satisfaction of the Owner's Representative. Surface defects, as such, include color and texture irregularities, cracks, spalls, air bubbles, honeycomb, rock pockets, fins and other projections on surface, and stains and other discolorations that cannot be removed by cleaning. Flush out form tie holes, fill with dry-pack mortar, or precast cement cone plugs secured in place with bonding agent.
1. All tie holes shall be filled with non-shrink grout a minimum of 1.5 inches in depth from each surface.
 2. Tie holes from tie systems using through-the-wall bolts shall be plugged using rubber plugs manufactured for use with form tie systems. Plugs shall be set in place as instructed by the manufacturer. After setting plugs, fill hole with epoxy grout to within 1.5 inches of the formed surface on each side of the plug.
 3. Repair concealed formed surfaces, where possible, that contain defects that affect the durability of concrete. If defects cannot be repaired, remove and replace concrete.
- C. Repair of Unformed Surfaces. Test unformed surfaces, such as monolithic slabs, for smoothness and verify surface plane to tolerances specified for each surface and finish. Correct low and high areas as herein specified. Test unformed surfaces sloped to drain for trueness of slope and smoothness by using a template having required slope.
1. Repair finished unformed surfaces that contain defects that affect durability of concrete. Surface defects, as such, include crazing and cracks in excess of 0.01-inch wide or that penetrate to reinforcement or completely through nonreinforced sections regardless of width, spalling, popouts, honeycomb, rock pockets, and other objectionable conditions.
 2. Correct high areas in unformed surfaces by grinding after concrete has cured at least 14 days.
 3. Correct low areas in unformed surfaces during or immediately after completion of surface finishing operations by cutting out low areas and replacing with patching compound. Finish repaired areas to blend into adjacent concrete.
 4. Repair defective areas, except random cracks and single holes not exceeding 1-inch-diameter, by cutting out and replacing with fresh concrete. Remove defective areas to sound concrete with clean, square cuts and expose reinforcing steel with at least 3/4-inch clearance all around. Dampen concrete surfaces in contact with patching concrete and

apply bonding compound. Mix patching concrete of same materials to provide concrete of same type or class as original concrete. Place, compact, and finish to blend with adjacent finished concrete. Cure in same manner as adjacent concrete.

- D. Repair isolated random cracks and single holes not over 1-inch-diameter by dry-pack method. Groove top of cracks and cut out holes to sound concrete and clean of dust, dirt, and loose particles. Dampen cleaned concrete surfaces and apply bonding compound. Mix dry-pack, consisting of one part portland cement to 2-1/2 parts fine aggregate passing a No. 16 mesh sieve, using only enough water as required for handling and placing. Place dry-pack before bonding compound has dried. Compact dry-pack mixture in place and finish to match adjacent concrete. Keep patched area continuously moist for not less than 72 hours.
- E. Perform structural repairs with prior approval of the Owner's Representative for method and procedure, using specified epoxy adhesive and mortar.
- F. Repair methods not specified above may be used, subject to acceptance of the Owner's Representative.

3.16 QUALITY CONTROL TESTING DURING CONSTRUCTION

- A. General. The Owner will employ a testing laboratory to perform tests and to submit test reports.
- B. Field Sampling and Testing. During concreting operations, the Owner's Representative will periodically require additional field inspection, sampling, and testing of cement, aggregate, and/or concrete by an independent testing laboratory in order to determine if the requirements of this specification section are being satisfied.
 - 1. Field sampling and testing of cement, aggregate, and concrete will be performed according to the following ASTM standards at a frequency determined by the Owner's Representative:
 - a. Aggregate
 - 1) Sampling ASTM D 75
 - 2) Testing Any test specified in ASTM C 33
 - b. Cement
 - 1) Sampling ASTM C 183
 - 2) Testing Any test specified in ASTM C 150
 - c. Concrete
 - 1) Sampling ASTM C 172

2)	Slump Test	ASTM C 143
3)	Air Content Test	ASTM C 231
4)	Making and Curing Test Cylinders	ASTM C 31
5)	Compression Strength Tests	ASTM C 39

2. Compressive strength testing will consist of making, curing, and testing cylinders of concrete. A total of six test cylinders will be prepared from each sample of concrete to be tested. Two test cylinders will be broken at an age of 7 days, three test cylinders will be broken at an age of 28 days, and the remaining test cylinders will be held in reserve. The minimum number of samples and test cylinders to be taken is as follows:

Total Size of Pour (CY)	Number of Samples	Number of Cylinders
1 – 100	1	6
101 – 200	2	12
201 - 300	3	18
Over 300	1/100 CY	6/100 Cy

3. Test cylinders will normally be laboratory-cured. However, the Owner's Representative may require tests on field-cured specimens to check the adequacy of curing operations.
4. A slump test and an air content test will be performed on each sample of concrete tested for compressive strength.
5. Cement and aggregate will be subject to inspection, sampling, and field testing at the batching plant. Concrete will be subject to inspection, sampling, and field testing at the place of concrete placement.
6. All field sampling, field testing, making and curing of field test cylinders, and laboratory testing performed during concreting operations for the purpose of determining if the requirements of this specification section are being satisfied shall be conducted by an independent testing laboratory selected by the Owner and paid for directly by the Owner and not as a part of this Contract.
7. Furnish the testing laboratory representative satisfactory samples of cement, aggregate, and concrete for inspection and testing purposes. The Contractor shall furnish any barrows, shovels, mixing boards, shaded area for preparing test cylinders, and similar equipment required by the testing laboratory representative for securing samples, making test cylinders, and conducting field tests.

- C. Test results will be reported in writing to the Owner's Representative, Ready-Mix Producer, and Contractor within 24 hours after tests. Reports of compressive strength tests shall contain the project identification name and number, date of concrete placement, name of concrete testing service, concrete type and class, location of concrete batch in structure, design compressive strength at 28 days, concrete mix proportions and materials, compressive breaking strength, and type of break for both 7-day tests and 28-day tests.
- D. Nondestructive Testing. Impact hammer, sonoscope, or other nondestructive device may be permitted but shall not be used as the sole basis for acceptance or rejection.
- E. Additional Tests. The testing service will make additional tests of in-place concrete when test results indicate specified concrete strengths and other characteristics have not been attained in the structure, as directed by the Owner's Representative. Testing service may conduct tests to determine adequacy of concrete by cored cylinders complying with ASTM C 42, or by other methods as directed. Contractor shall pay for any and all such tests.

3.17 LOADS APPLIED TO NEW CONCRETE

- A. Loads including, but not limited to, earth loads, loads exerted from bracing or shoring, wind loads, hydrostatic or hydraulic loads, equipment or vehicle loads, or loads exerted by stacked materials, shall not be applied to fresh concrete until the concrete has reached its specified 28-day strength.
- B. Concrete which has cracked due to overloading, loading before required strength has developed, or otherwise damaged shall be repaired or replaced as determined by the Owner's Representative.

3.18 INSTALLATION OF EPOXY ANCHORS AND DOWELS

- A. Verify number, size, depth, and location of anchors or dowels to be installed.
- B. Drill holes in concrete to the depth specified on the Drawings using methods as instructed by the epoxy manufacturer. The diameter of holes shall be as instructed by the epoxy manufacturer for the anchor or dowel being installed. Clean holes as instructed by the epoxy manufacturer.
- C. Install epoxy in strict accordance with the manufacturer's instructions using guns with self-mixing nozzles provided by the manufacturer. Verify epoxy is mixed prior to placement into the hole using methods per manufacturer's instructions. Insert dowel or anchor into the hole and hold steady as instructed by the manufacturer.

END OF SECTION

Supplemental Specification 01-00

PROJECT DOCUMENTATION AND SUBMITTAL REQUIREMENTS FOR ALL PUBLIC WORK PROJECTS AND SUBDIVISION DEVELOPMENTS

September, 2000

* Revised March, 2001

- 01.00 Project Submittals
- 01.01 Shop Drawings
- 01.02 Preconstruction Video
- 01.03 Progress Schedule
- 01.04 Release Statement for Disposal of Excavated Material
- 01.05 Traffic Control Plan
- 01.06 Contractor and Subcontractor Emergency Contact List
- 01.07 Statements of Final Compliance

01.00 PROJECT SUBMITTALS: The listed items shown above are the full responsibility of the **Prime Contractor** and or **Developer/Contractor**, hereafter shown as “**Contractor**”, and shall be made part of the administrative duties imposed upon this Contract. The Contractor shall be responsible for submitting all detail items prior to the contract Notice of Commencement, or as directed by the City’s Project Manager. All items shall be accompanied by a typewritten letter, on Company letterhead, clearly describing what is being submitted. If Contractor elects to fax any documentation due to expediency, the Contractor will be responsible for submitting hard copy for project documentation. Any and all submittals not clearly legible will be rejected.

All project submittals should be submitted with four copies, unless otherwise denoted.

Contractor will clearly affix a label or stamp identifying the submittal and its status for project review. Submittals shall be made in sufficient time to allow **at least 10 business days** for City’s review and execution. The City Project Manager shall assist the Contractor with any questions or clarification during this process to ensure timely response to the Contractor. All actions noted by the City other than “no exception taken” will require supporting notation or information for project review.

Payment for the performance of the work hereafter listed shall not be paid for directly, and shall be considered as a subsidiary obligation of the Contractor.

01.01 SHOP DRAWINGS:

- a) Upon written request from the Engineer, the Contractor shall submit detailed drawings, acceptable catalog data, specification and material certifications for all materials and/or equipment specialized or required for the proper completion of the work.
- b) Shop Drawings shall be submitted in not less than four (4) copies to the Engineer.
- c) Shop Drawings shall be submitted in proper sequence of construction to cause no delay in the work. The Engineer shall be given ten (10) business days to review submittals. The Contractor's failure to transmit appropriate submittals to the Engineer sufficiently in advance of work shall not be grounds for time extension. Also, no work shall be performed requiring shop drawings until same have been approved by the Engineer.
- d) Each Shop Drawing shall be labeled with the following:
 - 1. Project Name
 - 2. General Project Number (GP XXXX), if applicable
 - 3. Subdivision Description, if applicable
 - 4. Name of Contractor
 - 5. Name of Subcontractor (if applicable)
 - 6. Name and Address of Supplier and/or Manufacturer
 - 7. Log Reference Number
- e) The Contractor is responsible for reviewing and approving all shop drawings prior to submittal. The Engineer's review shall not be construed as placing on himself any responsibility for the accuracy of said drawings.

01.02 PRECONSTRUCTION VIDEO: Prior to actual construction, the Contractor shall have taken televised videos of the entire length and width of the work site.

- a) The Contractor shall notify the Engineering Department prior to scheduling the televising of the site. A representative of the Engineering Department shall be present when video is taken.
- b) Video shall be recoded on DVD. The video and audio recordings shall be compatible for replay on standard DVD devices.
- c) The video portion of the DVD shall have continuous time and date incorporated into it. DVD's shall be numbered consecutively along the site of the work. The locations and person(s) doing the work shall also be recorded.
- d) All DVD's shall become the property of the Engineer, and shall be submitted to and accepted in full by the Engineering Department prior to the start of construction.

01.03 PROGRESS SCHEDULE: The Contractor shall provide to the City, as mutually agreed upon at the Contract's Preconstruction meeting, a graphic progress schedule, which shall include the following:

- a) Progress schedule as a minimum to be prepared in bar graph fashion. The schedule shall be submitted, as a minimum, on 11" x 17" format for clarity and any necessary notations. Progress schedule shall include all work activities relative to the project, as further described in the Contract. Activities and rate of expected progress to secure completion as set forth in the Contract shall be shown on the schedule. Contractor to annotate any milestones that may be indicated in the Contract. Project completion date shall be clearly defined on the original schedule and all ensuing schedules provided.
- b) Schedules shall be updated, as a minimum, every 30 days, or as agreed to by the City's Project Manager.

01.04 RELEASE STATEMENT FOR DISPOSAL OF EXCAVATED MATERIAL:

- a) The Contractor shall provide to the City a written consent statement from all property owners that may be used as landfilled depositories for all surplus or unsuitable excavated material from the project site.
- b) The Contractor shall follow ODOT 203.05 for specific guidelines and name the "City of Canton" in lieu of "the Department" on all forwarded documents.
- *c) See attached sample copy for referencing purposes.

01.05 TRAFFIC CONTROL PLAN: Contractor shall submit a graphical presentation or written document detailing the signage to be used and its location for maintenance of traffic. If traffic control will be performed in stages, submit a plan for each stage. Any proposed detours should be approved by the City Traffic Engineer prior to plan submission.

01.06 CONTRACTOR AND SUBCONTRACTOR EMERGENCY CONTACT LIST: Contractor shall submit to the Engineer, prior to commencing construction, a complete list of the Contractor's personnel associated with the project. The list should include name, title, and emergency contact phone numbers for each individual.

01.07 STATEMENT OF FINAL COMPLIANCE: The Contractor shall submit to the City the following documentation, in addition to the Project's General Conditions. All submittals shall be completed and approved prior to the release of the final retainer.

- a) Certificates of Substantial and Final Completion Contractor to submit in writing, the date on which work is substantially completed and upon Final Completion. Any deviation from the stated contract completion date to what is being submitted shall be explained further by the Contractor. The City, at their discretion, will further review this subject, as needed. Not applicable for subdivision projects.

- b) Final Waiver of Lien Contractor shall furnish a written report indicating the resolution of any and all property damage claims filed with Contractor by any party during the contract period. The information shall include the name of claimant; date filed with Contractor; name of Insurance Company and/or Adjustor handling the claim; how the claim was resolved; if claim was not resolved for the full amount, a statement indicating the reason for such action. If there were no damage claims filed with the Contractor, then this shall be so stated in the report.

Supplemental Specification 02-00

TESTING FOR EXCESSIVE DEFLECTION FOR NON-PRESSURE THERMOPLASTIC SEWER PIPE

September, 2000

- 02.01 Description
- 02-02 Material
- 02-03 Testing for Deflection
- 02-04 Correcting/Repairing
- 02-05 Basis of Acceptance
- 02-06 Reference Material
- 02-07 Table 1, Deflection Diameter List

02.01 DESCRIPTION. This item shall consist of furnishing all labor, material and equipment, including all cleaning and flushing of new sewers to complete this test for approval by the City.

The cost for all work related to this item shall be considered incidental to the cost of the new sewer. No separate payment will be made by the City.

All main line sanitary sewers 8" in diameter and larger shall be tested for a maximum deflection of 5% of the pipe average inside diameter not less than 30 days after final full backfill, including all compaction efforts and jetting has been placed, as determined by the City. The average inside diameter is determined by the latest edition of ASTM D 3034, Appendix X1.

02.02 MATERIAL. The tests shall be conducted using electronic equipment specifically designed for measuring and recording deflection in flexible pipe or by the use of an approved deflection probe, having a diameter equal to 95% of the average inside diameter of the pipe being tested, pulled through the sewer line. See Table 1. for additional information.

The deflection probe shall be as available from Wortco, Inc.; Burke Concrete Accessories, Inc.; or equal, and shall be designed specifically for testing the deflection of the type of pipe specified. The probe shall incorporate an odd number (no less than 9) of 1/2" x 3/16" bar stock runners equally spaced on edge around and welded to the circumference of two minimum 1/4" thick circular steel plates. The diameter of the probes for the types and nominal sizes of the pipes to be tested shall be equal to 95% of the average inside diameter of the respective pipes as specifically given or determined by the Engineer from information given in the appropriate ASTM Standard for the pipe. The distance between plates, out-to-out, shall not be less than 2" smaller than the nominal diameter of the pipe to be tested. The runners shall extend approximately 1-1/2" beyond each plate, being bent inward for this distance at approximately 30°. A continuous 3/4" threaded rod shall be provided through the center of the plates, having a hex nut drawn tight against the inside face of each plate, and extending each side as required for providing a 3/4" ferrule loop insert or similar piece for attaching the pulling medium.

02.03 TESTING FOR DEFLECTION. The Contractor shall schedule with the City's Project Representative at least 48 hours in advance to the commencement of test.

The Contractor shall assign personnel or firm familiar with testing procedures and their requirements set forth.

The Contractor and City's Project Representative shall be present at all times during the testing procedure. All testing results shall be documented and recorded, at the time of test, on the City's approved test form.

Deflection test shall be performed between two consecutive manholes. If deflection probe is used, test shall be performed without mechanical pulling devices. Prior to the use of said deflection probe, a proving ring, provided by the Contractor and approved by the City, shall be available at the time the probe is used. The proving ring shall have an I. D. equal to the approved O. D. of the probe.

02.04 CORRECTING OR REPAIRING. If deflection probe becomes stuck or stopped for any reason between manholes, Contractor shall immediately notify the City Project Representative.

Contractor shall be responsible for all corrective procedures, methods and operational techniques. Following correctional procedure, as approved by the City, the Contractor shall be obligated to retest the section of pipe, as previously tested. If repair necessitated a replacement of pipe, the City reserves the right to require an additional retest of the said section, 30 days following this repair. All labor, material, and equipment necessary for correcting any new section of sewer shall be the responsibility of the Contractor.

02.05 BASIS OF ACCEPTANCE. In order for the City to consider a system , in part or whole, approved in this testing procedure, all deflection testing methods, as approved, shall be proofed from manhole structure to manhole structure.

02.06 REFERENCE MATERIAL. The City may reference ASTM D3034-96 for supplemental information.

02.07 Table 1, Deflection Diameter List

TABLE 1

**THERMOPLASTIC PIPE, PVC, SDR 35
AVERAGE INSIDE DIAMETERS
5.0% DEFLECTION MANDREL DIMENSIONS**

(DERIVED FROM ASTM D 3034)

NOMINAL PIPE SIZE (IN.)	SDR	AVERAGE INSIDE DIAMETER (IN.)	O. D. OF 5.0% DEFLECTION PROBE (IN.)
6	35	5.893	5.60
8	35	7.891	7.50
10	35	9.864	9.37
12	35	11.737	11.15
15	35	14.374	13.65

Canton City Eng. Dept.
Sept 2003/JMD

Supplemental Specification 02.doc

Supplemental Specification 03-00

TESTING PRACTICES FOR LOW-PRESSURE AIR TESTING OF INSTALLED, NON-PRESSURE, THERMOPLASTIC SEWER PIPE

September, 2000 with revisions 7/18/08

- 03.01 Description
- 03-02 Material/Safety
- 03-03 Testing for Leaks
- 03-04 Correcting/Repairing
- 03-05 Basis of Acceptance
- 03-06 Reference Material

03.01 DESCRIPTION. This item shall consist of furnishing all labor, material and equipment to complete this test for approval by the City.

The cost for all work related to this item shall be considered incidental to the cost of the new sewer. No separate payment will be made by the City.

All main lines and laterals shall be tested for air leaks and their associated level of acceptance.

Air testing of new main line and laterals may be done at any time during the installation of the new sewers, following the initial bedding, backfilling and securing are completed.

However, in the event deflection testing requires a repair or replacement of new sewer, the Contractor shall be obligated to re-air test the repaired section of the sewer.

03.02 EQUIPMENT/SAFETY

List of Equipment

03.021 Plug Design: Either mechanical or pneumatic plugs may be used. All plugs shall be designed to resist internal testing pressures without the aid of external bracing or blocking. However, the Contractor should internally restrain or externally brace the plugs to the manhole wall as an added safety precaution throughout the test.

03.022 Singular Control Panel: To facilitate test verification by the City, all air used shall pass through a single, above ground control panel.

03.023 Equipment Controls: The above ground air control equipment shall include a shut-off valve, pressure regulating valve, pressure relief valve, in-put pressure gauge

and a continuous monitoring pressure gauge having a pressure range from 0 to at least 10 psi. The continuous monitoring gauge shall be no less than 4 inches in diameter with minimum divisions of 0.10 psi and an accuracy of +/-0.04 psi.

03.024 Separate Hoses: Two separate hoses shall be used to: (1) connect the control panel to the sealed line for introducing low-pressure air, and (2) an separate hose connection for constant monitoring of air pressure build-up in the line. This requirement greatly diminishes any chance for over-pressurizing the line.

03.025 Pneumatic Plugs: If pneumatic plugs are utilized, a separate hose shall also be required to inflate the pneumatic plugs from the above ground control panel.

03.026 Air Source: As approved by the City.

03.03 TESTING FOR LEAKS. The Contractor shall arrange with the City's Project Representative at least 48 hours in advance to the commencement of test.

The Contractor shall assign personnel or firm familiar with testing procedures and their requirements set forth.

The Contractor and City's Project Representative shall be present at all times during the testing procedure. All testing results shall be documented and recorded, at the time of test, on the City's approved test form.

After backfilling, air tests shall be conducted between two consecutive manholes.

Each end of the section to be tested and all pipe outlets in the section shall be plugged with approved test plugs. One plug used at a manhole shall have an inlet tap or other provision for connecting an air hose from the air supply equipment. The equipment shall include valves to control the rate at which air flows into the test section and pressure gauges with minimum graduations of 0.1 psi and an accuracy of +/- 0.04 psi to monitor the air pressure within the test section.

Air pressure shall be applied slowly to the test section until the pressure reaches 4.0 psi, plus an adjustment of 0.433 psi for each foot of ground water above the crown of the pipe being tested. Internal air pressure, including adjustment for ground water, should never exceed 5.0 psi. When the pressure reaches 4.0 psi, plus adjustment for ground water, the air supply shall be throttled so that the internal pressure is maintained between 4.0 and 3.5 psi for at least two minutes to permit temperature stabilization. When the pressure has stabilized and is at or above 3.5 psi, the air supply shall be disconnected and a stop watch started and allowed to run until the pressure has dropped 1.0 psi

The permissible time allocated for the 1.0 psi pressure drop shall be calculated on the basis of the diameter and length of main sewer tested and no adjustment shall be made for service connections included in the test section. The air test for a section shall be considered acceptable

if the time elapsed for the 1.0 psi pressure drop is equal to or greater than the time indicated, and shall be considered unacceptable if the elapsed time is less than that indicated in the following table:

MINIMUM HOLDING TIME IN MINUTES:SECONDS REQUIRED FOR 1.0 PSI PRESSURE DROP **								
PIPE DIAMETER	LENGTH OF MAIN LINE TESTED *							
	100'	150'	200'	250'	300'	350'	400'	450'
4"	3:46	3:46	3:46	3:46	3:46	3:46	3:42	3:46
6"	5:40	5:40	5:40	5:40	5:40	5:40	5:42	6:24
8"	7:34	7:34	7:34	7:34	7:36	8:52	10:08	11:24
10"	9:26	9:26	9:26	9:53	11:52	13:51	15:49	17:48
12"	11:20	11:20	11:24	14:15	17:05	19:56	22:47	25:38
15"	14:10	14:10	17:48	22:15	26:42	31:09	35:36	40:04
18"	17:00	19:13	25:38	32:03	38:27	44:52	51:16	57:41
21"	19:50	26:10	34:54	43:37	52:21	61:00	69:48	78:31
24"	22:47	34:11	45:34	56:58	68:22	79:46	91:10	102:33
27"	28:51	43:16	57:41	72:07	86:32	100:57	115:22	129:48

* Interpolate time for intermediate lengths.

** If the test section fails and service connections were included in the test, re-compute test time to include service connections in accordance with 9.6 of ASTM F1417.

03.04 CORRECTING OR REPAIRING. If air testing procedure fails for any reason, based on limitation previously set forth, the Contractor shall immediately notify the City Project Representative.

Contractor shall be responsible for all corrective procedures, methods and operational techniques. Following correctional procedure, as approved by the City, the Contractor shall be obligated to retest the section of pipe, as previously tested. If repair necessitated a replacement of pipe, the City reserves the right to retest the said section, 30 days following this repair. All labor, material, and equipment necessary for correcting any new section of sewer shall be the responsibility of the Contractor.

03.05 BASIS OF ACCEPTANCE. In order for the City to consider a system, in part or whole, approved in this testing procedure, all air testing methods, as approved, shall be proofed from manhole structure to manhole structure.

03.06 REFERENCE MATERIAL. The City may reference UNI-BELL PVC PIPE ASSOCIATION, UNI-B-6-90 for supplemental information.

Supplemental Specification 04-01

STANDARD TEST METHOD FOR CONCRETE SEWER MANHOLES BY THE NEGATIVE AIR PRESSURE TEST

April, 2001

04.01 Scope

04.02 Description

04.01 SCOPE

This test method covers procedures for testing precast concrete manhole sections when using the vacuum test method to demonstrate the integrity of the installed materials and the construction procedures. This test method is used for testing concrete manhole sections utilizing mortar, mastic, or gasketed joints.

This test method is intended to be used as a preliminary test to enable the installer to demonstrate the condition of the concrete manholes prior to backfill. It may also be used to test manholes after backfilling; however, testing should be correlated with the connector supplier.

This standard does not purport to address all of the safety problems, if any, associated with its use. It is the responsibility of the user of this standard to establish appropriate safety and health practices and determine the applicability of regulatory limitations prior to use.

04.02 DESCRIPTION

See attached ASTM C 1244-93

Supplemental Specification 05-01

SANITARY SEWER CLOSED CIRCUIT TELEVISION (CCTV) INSPECTION AND DOCUMENTATION PROCEDURE

June 2001

- 05.01 Description
- 05-02 Equipment
- 05-03 Maintenance of Traffic
- 05-04 Safety
- 05-05 Procedures for Reducing Excessive Sewerage Flow
- 05-06 Documentation of Televised Sewer Inspection

05.01 DESCRIPTION. This item shall consist of furnishing all labor, material and equipment, as specified under this section, to complete closed circuit televising and documenting sewers of various sizes, as shown on the plans or as directed by the City Engineer.

The cost for all work related to this item shall be considered incidental to the cost of the new or modified sewer. No separate payment will be made by the City.

All main lines shall be inspected and documented for acceptability and provide documentation to any potential problems or deviations from the proposed specifications

Televising inspection service may be done simultaneously with deflection test as approved by the City Engineer. However, in the event of deflection failure or low pressure air testing fails and a repair or replacement of the sewer is required, the Contractor shall be obligated to re-televising and document the repaired section of the sewer.

The Contractor shall be responsible for obtaining information such as: depth of flow, sewer velocities, rates of flow, manhole depths, air quality in sewers, traffic conditions and other pertinent information which may be necessary to complete the work as specified.

05.02 EQUIPMENT List of Equipment

05.021 Television Camera: The television camera used for the inspection shall be one specifically designed for such inspection and have radial view capability. The lighting for the camera shall be suitable to allow a clear picture of the entire periphery of the pipe. The camera shall be operative in 100% humidity conditions and shall have either automatic or remote focus and iris controls. The camera, television monitor, video recorder and all other components of the video system shall be capable of producing color picture quality to the satisfaction of the City Engineer. The videotape with audio shall be provided on 2-hour VHS cassettes with a tape

width of ½ inch and be recorded in the 2-hour mode. The videotape shall be of the long life, self lubricating type, produced under rigid quality control standards and provide the highest quality picture and sound.

The camera shall be moved through the sewer line by devices that do not obstruct the camera view or interfere with proper documentation of sewer conditions.

05.022 Camera Monitor: The monitor shall be located on-site within a mobile TV studio large enough to accommodate a minimum of four people for the purpose of viewing the monitor during the inspection process. The City Engineer or his representative shall have access to view the monitor at all times.

05.023 Winching: When manual operated winches are used to pull the camera through the sewer line, telephones or other suitable means of communication must be established between the winch operator and the video system operator.

05.024 Accuracy: The importance of accurate distance measurements is emphasized. The video equipment shall be capable of recording an accurate horizontal distance measurement from the starting point to the point of observation of the camera. Markings on the cable, or the like, which would require interpolation for the depth of manholes is not acceptable. Accuracy of the metering device shall be verified by use of a walking meter, roll-a-tape, or other approved device, and shall be satisfactory to the City Engineer or his representative.

05.025 Miscellaneous:

LEAVE BLANK

05.03 MAINTAINING TRAFFIC : The Contractor shall arrange with the City's Project Representative at least 48 hours in advance to the commencement of procedure.

The Contractor shall be responsible for maintaining traffic at all times in accordance with the requirements set forth in the Ohio Manual of Uniform Traffic Control Devices and as per Item 614-Maintaining Traffic, of the latest edition of the Ohio Department of Transportation, Construction and Material Specifications.

All traffic control devices including plastic drums, cones, temporary signs, flashing arrow panels, etc. shall be placed in accordance with the O.D.O.T. Standard Drawings.

Any temporary roadway or lane closing(s) shall be kept to a minimum and must be approved and coordinated with the City's Traffic Engineering Office at least five (5) working days in advance. The City's Traffic Engineering Office shall notify the news media and emergency departments when necessary.

The Contractor shall maintain access to and from all properties along the line of work at all times, unless otherwise coordinated and approved by the Engineer.

05.04 SAFETY: The Developer/Contractor shall be responsible for conducting his work in accordance with all applicable laws as prescribed by the "Occupational Safety and Health Act of 1970" and shall do everything reasonable necessary to protect the life, health, safety and welfare of any employee, visitor or pedestrian.

05.05 PROCEDURES FOR REDUCING EXCESSIVE SEWERAGE FLOW (during sewer televising):

Reducing flow shall be performed with the approval of the City when the flow at the upstream manhole, of the sewer section to be televised, is greater than 33% of the pipe diameter. In the event that televising is not permitted, due to excessive depth of flow, the Contractor shall perform the work by one of the following methods only as directed by the City Engineer:

1. Televising may be performed during low flow periods (off peak hours), such as night hours. No additional compensation will be paid by the City for this work. Times for the above work shall be scheduled by the City Engineer.

2. A sewer plug, or sand bags, shall be inserted into the line upstream of the section being televised to achieve the required maximum depth of flow. (The plug shall be so designed that all or any portion of the sewage can be released during the televising inspection.) Immediately after the work has been completed for that particular section of sewer, the flow shall be restored to normal.

3. Bypass Pumping: When required, as noted above, the Contractor shall supply the pumps, conduits, and other equipment to divert the flow of sewage around the sewer section to

be televised. The bypass system shall be of sufficient capacity to handle existing flow plus additional flow that may occur during a rainstorm.

NOTE: When flow in a sewer is plugged, blocked or bypassed, the Contractor must take sufficient precautions to protect the sewer lines from damage that might result from sewer surcharging. Further precautions must be taken to insure that sewer flow control operations do not cause flooding or damage to public or private property being served by the sewer system. The Contractor shall be solely responsible for any damages as a result of their actions.

05.06 DOCUMENTATION OF TELEVISED SEWER INSPECTION:

The Contractor shall assign personnel or firm familiar with televising procedures and their requirements set forth.

The Contractor and City's Project Representative shall be present at all times during the televising procedure, unless otherwise approved by the City Engineer.

Original color videotape recordings shall be forwarded to the City Engineer for replay and shall become the property of the City upon final approval of the City Engineer. The tapes shall be professionally labeled showing the City's name, the lines or sections recorded on the tape, tape number as referenced on a log, the name of the Contractor, and other labeling approved by the City Engineer. Reprocessed tapes or copies will not be accepted. All unacceptable tapes will be returned to the Contractor.

An accurate and continuous footage reading shall be superimposed on the video recording for each line inspected. The header shown on the tape prior to inspecting each line shall include at a minimum, the date of inspection, the diameter of the sewer and the manhole number designation for each manhole on the line section inspected, as established and referenced on the Contractor's inspection log.

The camera may be moved through the sewer line in either direction, at a rate not to exceed 30 feet per minute, and stopping when necessary to permit proper documentation of the sewer's condition, as outlined elsewhere in this section.

The video recording shall be augmented with audio voice recording calling out the nomenclature of the sewer system, the pipe, manholes, wyes, debris, mud, roots, water, "event" (bad joints, cracked, damaged, or deformed pipe) or any other information that would be of use to internal inspection of sewers.

The voice shall be clean, concise, and loud enough to overcome any background noise from machinery or equipment. the audio annotation shall start by identifying the pipe footage from the downstream manhole of the run and then go on to identify the "event". The camera shall stop at each "event" if it is something out of the ordinary as indicated above. It is left to the discretion of the Contractor as to whether the "event" is of such severity (or unidentifiable) to warrant reversing the camera one or more times to catch a better view.

At locations of the “events” described above, as well as at all service connections, the camera’s radial view capabilities shall be utilized where appropriate, to carefully view the “event” so as to allow the City to make a better determination of the severity of a problem or to determine the condition of service line connections.

In addition to videotape recordings, the Contractor shall furnish the City with one copy of a television inspection log. This inspection log shall be printed on a format pre-approved by the City. The log shall accurately describe in detail and reference all information required on the videotape recording of each section chronologically.

SPECIAL PROVISIONS

These Special Provisions elaborate upon, clarify and amend some of the Specifications and clauses of the Contract documents; they are a part of the Contract documents and change and amend those found elsewhere only in the manner and to the extent stated.

Federal Government Participation:

An agency of the Government may be participating financially in this project. Attention is called to the various requirements of the Federal Government in connection with this contract, all of which are contained herein, and especially to those pertaining to Labor Standards and non-discrimination in employment.

Equal employment opportunity

The Contractor will comply with all provisions of Executive Order Number 11246 of September 24, 1965, and of rules, regulations, and relevant orders of the Secretary of Labor.

E.E.O. Requirements:

All bidders will be required to comply with the City Contract Compliance Program regarding equal employment opportunity. E.E.O. Booklet and Compliance Forms will be supplied to you by the Office of Neighborhood Development of the City of Canton, the completion of which is one of the contract requirements. This form must be satisfactorily completed and reviewed, and your company must be in compliance prior to the awarding of contracts. The Board of Control will not consider any awarding of contracts until the company is fully in compliance with the requirements of Section 507.03 (b) of the Canton City Code.

Chapter 507

Equal employment opportunity in public contracts

- 507.01 Definitions.
- 507.02 Administration of program.
- 507.03 Equal employment opportunity clause.
- 507.04 Contract compliance requirements.
- 507.05 Pre-award conference.
- 507.06 Project site reports.
- 507.07 Canton Hometown Plan.
- 507.08 Construction contracts involving the Canton Hometown Plan.
- 507.09 Exemptions for contracts not involving Canton Hometown Plan.
- 507.10 Intergovernmental cooperation.
- 507.11 Severability clause.

CROSS REFERENCES

Unlawful discriminatory practices - see Ohio R. C. 4112.02

Contracts - see ADM. Ch. 105

Unlawful interest in public contract - see GEN. OFF. 525.10

507.01 Definitions.

As used in this chapter, certain terms are defined as follows:

(a) “Discriminate” and “discrimination” means to distinguish, differentiate, separate or segregate solely on the basis of race, religion, color, sex or national origin.

(b) “Contractor” means any person, partnership, corporation, association or joint venture, and includes each and every subcontractor on such a contract and every supplier of equipment or supplies.

(c) “Subcontractor” means any person, partnership, corporation, association or joint venture which supplies any of the work, labor, services, supplies, equipment, materials or any combination of the foregoing under a contract with the contractor on a public contract.

(d) “Public Contract” means any contract awarded by the City whereby the City is committed to expend or does expend its funds in return for work, labor, services, supplies, equipment, materials or any combination of the foregoing, or any lease, lease by way of concession, concession agreement, permit or permit agreement whereby the City leases, grants or demises property of the City or otherwise grants a right or privilege to occupy or use property of the City.

(e) “Bidder” means any person, partnership, corporation, association or joint venture seeking to be awarded a public contract.

(f) “Construction contract” means any public contract for the construction, rehabilitation, alteration, conversion, extension or repair of buildings, streets or other improvements to real property. (Ord. 179-74. Passed 6-17-74.)

507.02 Administration of program.

The Executive Secretary of the City Fair Employment Practices Commission, hereinafter referred to as the Executive Secretary, with the assistance of the Director of Public Safety, shall administer and enforce the provisions of this chapter and shall adjust, promulgate and enforce rules and regulations relating to any matter or thing pertaining to the administration and enforcement of the provisions of this chapter. (Ord. 179-74. Passed 6-17-74.)

507.03 Equal employment opportunity clause.

(a) Except as provided in Sections 507.07 and 507.08, all public contracts hereinafter entered by the City in excess of one thousand five hundred dollars (\$1,500) shall incorporate an equal employment opportunity clause which shall read as follows:

(b) During the performance of this contract, the Contractor agrees as follows:

(1) The Contractor shall not discriminate against any employee or applicant for employment because of race, religion, color, sex or national origin. The Contractor shall take affirmative action to insure that applicants are employed and that employees are treated during employment

without regard to race, religion, color, sex or national origin. As used herein, the word “treated” shall mean and include without limitation the following: recruited, whether by advertising or other means; compensation, whether in the form of rates of pay or other forms of compensation; selected for training, including apprenticeship; promoted; demoted; upgraded; downgraded; transferred; laid off; and terminated. The Contractor agrees to and shall post in conspicuous places available to employees and applicants for employment notices to be provided by the contracting officers setting forth the provisions of this nondiscrimination clause.

(2) The Contractor shall, in all solicitations or advertisements for employees placed by or on behalf of the Contractor, state that all qualified applicants will receive consideration for employment without regard to race, religion, color, sex or national origin.

(3) The Contractor shall send to each labor union or representative of workers, with which he has a collective bargaining agreement or other contract or understanding, a notice advising the labor union or workers’ representative of the Contractor’s commitments under the equal opportunity clause of the City; and he shall post copies of the notice in conspicuous places available to employees and applicants for employment.

(4) The Contractor shall submit in writing to the City his affirmative action plan, and each subcontractor and supplier of equipment or supplies shall submit to the general contractor his affirmative action plan. The responsibility for securing these affirmative action plans falls upon the general contractor and shall be on file at the office of the general contractor. The Contractor shall furnish all information and reports required by the City or its representative pursuant to this chapter, and shall permit access to his books, records, and accounts by the contracting agency and by the Executive Secretary for purposes of investigation to ascertain compliance with the program.

(5) The Contractor shall take such action with respect to any subcontractor as the City may direct as means of enforcing the provisions of this equal opportunity clause, including penalties and sanctions for noncompliance; provided, however, that in the event the Contractor becomes involved in or is threatened with litigation as the result of such direction by the City, the City will enter into such litigation as is necessary to protect the interests of the City and to effectuate the City’s equal opportunity program and, in the case of contracts receiving Federal assistance, the Contractor or the City may request the United States to enter into such litigation to protect the interests of the United States.

(6) The Contractor shall file and shall cause his subcontractors, if any, to file compliance reports with the City in the form and to the extent prescribed by the City or its representative. Compliance reports filed at such times as directed shall contain information as to the employment practices, policies, programs and statistics of the Contractor and his subcontractors.

(7) The Contractor shall include the provisions of this equal employment opportunity clause in every subcontract or purchase order, so that such provisions will be binding upon each subcontractor or vendor.

(8) Refusal by the Contractor or subcontractor to comply with any portion of this program as herein stated and described will subject the offending party to any or all of the following penalties:

A. Withholding of all future payments under the involved public contract to the Contractor in violation, until it is determined that the Contractor or subcontractor is in compliance with the provisions of this contract.

B. Refusal of all future bids for any public contract with the City or any of its departments or divisions, until such time as the Contractor or subcontractor demonstrates that he has established and shall carry out the policies of the program as herein outlined.

C. Cancellation of the public contract and declaration of forfeiture of the performance bond.

D. In cases in which there is substantial or material violation or the threat of substantial or material violation of the compliance procedure or as may be provided by contract, appropriate proceedings may be brought to enforce these provisions, including the enjoining within applicable laws of contractors, subcontractors or other organizations, individuals or groups who prevent, directly or indirectly, or seek to prevent, directly or indirectly, compliance with the policy as herein outlined. (Ord. 179-74. Passed 6-17-74.)

507.04 Contract compliance requirements.

(a) All notices to prospective bidders published on behalf of the City shall include, as a part of the contract specifications, the condition that all bidders will be required to comply with the City Contract Compliance Program regarding equal employment opportunity. All reports required herein shall be submitted in duplicate to the department, division or other agency letting the contract.

(b) Each bidder shall file, as part of the bid documents, contract employment reports with the City contracting agency or as may be directed by the City or its representative. Such contract employment reports shall include such information as to the employment practices, policies, programs and statistics of the Contractor and shall be in such form as the City may prescribe. (Ord. 179-74. Passed 6-17-74.)

507.05 Pre-award conference.

Following receipt and review of the employment information submitted by the bidders and prior to the award of a contract, the apparent successful bidder and his known major subcontractors shall be required to attend a pre-award conference if called by the Executive Secretary, at which time such bidder and major subcontractors shall submit affirmative action programs to promote equal opportunity in employment. The Executive Secretary shall determine whether or not the apparent successful bidder has complied with this chapter and shall submit his determination and recommendation thereon to the Mayor, the director of the department or division involved and the Board of Control. In the event that a contractor did not comply under the terms of this chapter, he shall be afforded a hearing before the Mayor, the City Solicitor and the President of Council within ten days from the date that such contractor is notified of his noncompliance. (Ord. 179-74. Passed 6-17-74.)

507.06 Project site reports.

Subject to Sections 507.07 and 507.08, where a construction contract exceeds ten thousand dollars (\$10,000), a project site report shall be completed and submitted by the Contractor and any subcontractor not more than ninety days from the beginning of work on the site. Such project site report shall include such information as to the employment practices and statistics of the Contractor and each subcontractor and shall be in such form as the Executive Secretary may prescribe. Where the term of the contract exceeds ninety days, such project site report shall be submitted once every ninety days or more frequently if the Executive Secretary determines that such submittal is deemed necessary for continuing evaluation of the work force composition. Subcontractors shall complete and submit such project site reports to the Contractor for transmittal to the City. Post award reports shall be reviewed as one means of determining contract compliance. (Ord. 179-74. Passed 6-17-74.)

507.07 Canton Hometown Plan.

The Canton Hometown Plan which is composed of the East Ohio Building and Construction Trades Council, a coalition of employer associations consisting of the Ohio Contractors Association of East Central Ohio, other employers' groups and the Black Coalition of Canton is hereby adopted by reference and made a part hereof as though fully rewritten herein. (Ord. 179-74. Passed 6-17-74.)

507.08 Construction contracts involving the Canton Hometown Plan.

All construction contracts hereinafter entered by the City in excess of one thousand five hundred dollars (\$1,500) which involve contractors who are signatories and in compliance of the Canton Hometown Plan shall not be governed by the equal employment opportunity clause herein, but shall comply with the requirements and terms of the Canton Hometown Plan, providing the Canton Hometown Plan:

- (a) Is in full force and effect at the time of the contract;
- (b) Is approved by the proper Federal and/or State authorities; and
- (c) Through its administrative or executive committee on a regular basis beginning on September 1, 1974, files quarterly reports with the Executive Secretary.

In the event one or more of the conditions enumerated in subsections (a), (b) and (c) hereof are not in effect, or a contractor is not a signatory of the Canton Hometown Plan and in compliance herewith, at the time the construction contract is entered with the City as herein provided, such construction contracts shall be governed by the equal opportunity clause herein. (Ord. 179-74. Passed 6-17-74.)

507.09 Exemptions for contracts not involving Canton Hometown Plan.

All construction contract hereinafter entered by the City in excess of one thousand five hundred dollars (\$1,500), which involve contractors who are not signatories of the Canton Hometown Plan and have in their employ four or less persons, shall be exempted from the application of the equal employment opportunity clause provided herein. (Ord. 179-74. Passed 6-17-74.)

507.10 Intergovernmental cooperation.

In the event specific discriminatory practices are found to exist in the administration and enforcement of this chapter, in addition to the sanctions that may be imposed as provided by the terms of the contract, the City may forward all pertinent information to the appropriate Federal and State agencies. (Ord. 179-74. Passed 6-17-74.)

507.11 Severability clause.

Sections 507.01 through 507.10, inclusive, and each part of such sections are hereby declared to be independent sections and parts of sections; and notwithstanding any other evidence of legislative intent, it is hereby declared to be the controlling legislative intent that if any provisions of such sections or the application thereof to any person or circumstance is held invalid, the remaining sections or parts of sections and the application of such provision to any person or circumstances, other than those as to which it is held invalid, shall not be affected thereby. It is hereby declared that this chapter would have been passed independently of such sections, or parts of a section, so held to be invalid. (Ord. 179-74. Passed 6-17-74.)

§ Section 105 of City Codified Ordinances

105.01 CONSTRUCTION CONTRACTS

(a) Definitions- For purposes of this chapter, the following definitions shall apply:

(1) "Public contract" or "construction project" means either of the following:

A. Any new construction of any public improvement, the total overall project cost of which is estimated to be more than one hundred thousand dollars (\$100,000) and performed by other than full-time employees of the City who have completed their probationary periods in the classified service. Determination of project cost shall be subject to be the biennial increase or decrease provided for by Ohio R.C. 4115.034; or

B. Any construction, reconstruction, improvement, enlargement, renovation, alteration, repair, painting or decorating of any public improvement, which is estimated to be more than \$20,000.00 and performed by other than full-time employees of the City who have completed their probationary periods in the classified service. Determination of project cost shall be subject to the biennial increase or decrease provided for by Ohio R.C. 4115.034

(2) "Public improvement" includes all buildings, roads, streets, alleys, sewers, ditches, sewage disposal plants, water works and all other structures or works constructed by the City or by any person or entity, who, pursuant to a contract with the City, constructs any public improvement for the City. A public improvement shall be considered as one project where a review of the nature, scope and objective, as well as the interrelationship of time and purpose of the project, evidences the undertaking of a single public improvement pursuant to Ohio R.C. 4115.033 and O.A.C. 4101:9-4-17.

(3) "Local employee" means:

A. A person residing within the City of Canton or Stark County;

B. A person working for a contractor or from a pool of labor located within the City of Canton or Stark County; or

C. Due to the specialty nature of the employment to be performed, where a suitable person meeting either subsection (a)(3)A. or B. hereof is not available, a person residing or working within a location as close to Canton as is available. A "suitable person" means a person who is qualified to perform the work or trainable within a reasonable period of time.

(b) Project Labor Agreement

(1) In connection with the public bidding and contract awarding process for every proposed public contract or construction project, the Mayor, or his designee, shall evaluate whether a project labor agreement will advance the City's procurement interest in cost, efficiency, and quality while promoting labor-management stability as well as compliance with applicable legal requirements governing safety and health, equal employment opportunity, labor and employment standards, and other related matters.

(2) If the Mayor, or his designee, determines that a project labor agreement will serve the goals set forth above, the Mayor, or his designee, shall negotiate a project labor agreement with the East Central Ohio Building and

Construction Trades Council and its affiliated local unions, or said Council's successor.

(3) The bidding documents for each such construction project shall contain a written provision requiring the successful bidder to comply with and adhere to all of the provisions of any project labor agreement negotiated by the Mayor for the project.

(4) The City shall not thereafter enter into any contract with the successful bidder for the construction of any such city building unless the contract contains a provision requiring the successful bidder, and all of the bidder's contractors and subcontractors, to comply with and adhere to the provisions of the negotiated project labor agreement.

(5) If the Mayor, or his designee, with respect to any proposed construction project, determines that a project labor agreement will not serve the goals set forth in subsection (b)(1), the Mayor shall submit a written report to the Clerk of Council that shall state the reasons for concluding that a project labor agreement for the project will not substantially further the purposes of this section.

(c) Bids and Required Bidder Information. Upon Council approval, the Director of Public Service and/or Director of Public Safety shall advertise and accept bids for a construction project in accordance with the following procedures:

(1) Contracts shall be bid as follows:

- A. An aggregate bid from a general contractor; or
- B. Separate bids for work and materials from multiple prime contractors.

(2) Bidders for all proposed construction projects shall be required to furnish the following information:

- A. The work, supplies and materials covered by the bidder's bid.
- B. Identification of all work to be subcontracted. All subcontractors are also subject to the approval of the Board of Control based on the criteria contained in this section.
- C. Descriptions of bidder's experience with projects of comparative size, complexity and cost within recent years, demonstrating the bidder's ability and capacity to perform a substantial portion of the project with its own forces.
- D. Documentation from previous similar projects regarding timeliness of performance, quality of work, extension requests, fines and penalties imposed and payments thereof, liens filed, history of claims for extra work, contract defaults, together with explanations of the same.
- E. The number of years the bidder has been actively engaged as a contractor in the construction industry.
- F. The bidder's recent experience record in the construction industry, including the original contract price for each construction job undertaken by the bidder, the amount of any change orders or cost overruns on each job, the reasons for the change orders or cost overruns, and the bidder's record for complying with and meeting completion deadlines on construction projects.
- G. Identification of any projects within the previous five years that the

bidder was determined by a public entity not to be a responsible bidder, the reasons given by the public entity, together with an explanation thereof.

H. Demonstration of financial responsibility to assure that the bidder possesses adequate resources and availability of credit, the means and ability to procure insurance and acceptable performance bonds required for the project and whether any claims have been made against performance bonds secured by the bidder on other construction projects.

I. Disclosure of any suspension or revocations of any professional license of any director, officer, owner, or managerial employees of the bidder, of the extent that any work to be performed is within the field of such licensed profession.

J. Disclosure of any and all OSHA violations within the previous three years, as well as all notices of OSHA citations filed against the bidder in the same three year period, together with a description and explanation of remediation or other steps taken regarding such violations and notices of violation.

K. Disclosure of any and all violations within the previous five years pertaining to unlawful intimidation or discrimination against any employee by reason of race, creed, color, disability, gender, or national origin and/or violation of any employee's civil or labor rights or equal employment opportunities.

L. Disclosure of any litigation (including copies of pleadings) in which the bidder has been named as a defendant or third party defendant in an action involving a claim for personal injury or wrongful death arising from performance of work related to any project in which it has been engaged within the previous five years.

M. Disclosure of allegations of violations of the prevailing wage law and any other state or federal labor law, including, but not limited to, child labor violations, failure to pay wages, or unemployment insurance tax delinquencies or unfair labor practices within the past five years.

N. Disclosure of violations of the workers compensation law.

O. Disclosure of any criminal convictions or criminal indictments, involving the bidder, its officers, directors, owners, and/or managers within the past five years.

P. Disclosure of any violation within the past five years or pending charges concerning federal, state, or municipal environmental and/or health laws, codes, rules and/or regulations.

Q. Documentation that the bidder provides health insurance and pension benefits to its employees.

R. The experience and the continuity of the bidder's work force.

S. The identity of the bidder's permanent work force that will be employed on the public contract, to include the number of employees (or contract labor) to be assigned to the contract, their city and state of residence, and their job descriptions or trade specialities.

T. The identity of any temporary work force that will be employed on the public contract, to include the number of employees (or contract labor) to be assigned to the contract, their city and state of residence, and their job

descriptions or trade specialities.

U. Whether the bidder's work force is drawn mainly from local employees. The number of local employees, as defined in paragraph (a)(3), and their job descriptions or trade specialities that the bidder will employ on the public contract.

V. When a bidder claims that non-local employees (or non-local contract labor) are to be assigned to the public contract instead of local employees, the reasons therefor.

W. When a bidder claims that local employees are not intended to be used by the bidder on the public contract because they are not available, qualified or trainable within a reasonable period of time, the reasons therefor.

X. Whether the bidder participates in a bona fide apprenticeship program that is approved by the Ohio State Apprenticeship Council and the United States Department of Labor.

Y. Whether the bidder has adopted and implemented a comprehensive drug and alcohol testing program for its employees.

Z. Whether the bidder's employees are OSHA-10 and/or OSHA-30 certified.

(d) Each factor enumerated in subsection (c)(2), standing alone, shall not be considered as determinative of the lowest and best bid. The City shall have complete discretion in assessing the level of importance to be placed upon any one or more of the factors enumerated and in determining the lowest and best bid and in awarding the construction contract.

(e) All bid invitations and specifications for construction, repair and renovation work shall advise prospective bidders of all of the factors that will be taken into consideration by the Board of Control in determining whether a bid is not only the lowest but the "best" bid. Bid specifications shall contain provisions conforming to this chapter, including a form or forms to enable a bidder to provide evidence to the Board of Control of the bidder's compliance with, adherence to, or satisfaction of, the various factors that shall be considered by the Board in determining the lowest and best bid.

(Ord. 86-2009. Passed 5-18-09.)

105.02 CONFORMANCE WITH LOCAL UNION PRACTICES

(EDITOR'S NOTE: This section was repealed by Ordinance 99-89, passed May 22, 1989.)

105.03 U.S. STEEL USAGE REQUIRED; EXCEPTION

All City contracts shall stipulate or provide that all steel necessary in the construction of any work performed under such contracts shall be steel that is produced in the United States unless a specific product which is required is not produced by manufacturers in the United States in which event this prohibition does not apply. This section shall apply to only contracts awarded by the Board of Control of the City. (Ord. 224-77. Passed 6-27-77.)

105.04 EMERGENCY CONTRACTUAL PROCEDURES

(a) Upon the occurrence of any emergency situation within City government that affects the health, safety and welfare of this City and which requires the immediate attention on the part of the executive members of City government, the appropriate City official, i. e. Mayor, Service Director or Safety Director, a written report shall be submitted to the Clerk of Council with a copy of this report to the Chairman of the Finance Committee and, if applicable, a copy to the chairman of any other committee of Council that normally will be charged with the responsibility of the subject matter of the emergency.

(b) Such written report and copy or copies shall be submitted to Council for the Council agenda for the next succeeding Council meeting, as long as the emergency did not exist seventy-two hours before the preceding meeting.

(c) The written report shall be placed on the Council agenda for the next succeeding Council meeting.

(d) Written reports shall to the extent possible:

- (1) Describe the nature of the emergency;
- (2) Provide the various alternatives being provided to correct the problem;
- (3) Name the appropriate department head charged with the responsibility of coping with the emergency;
- (4) Name contractors or persons who are being considered to undertake the responsibility of dealing with such an emergency;
- (5) Name the contractors or persons who are performing the work necessary to undertake the responsibility of dealing with the emergency;
- (6) Provide the estimate cost for such an undertaking if this information is available; and
- (7) Provide effort and time for the work to be performed by such contractors or persons if available, and other relevant information that is necessary to give Council the full picture and the process being used to determine the resolution of such emergency.

(e) Strict compliance of the foregoing on the part of those who may have to proceed with the remedy or repair of an emergency situation without prior legislative authority will be a substantial consideration on the part of Council in subsequently enacting the legislation to compensate the person who has undertaken such emergency work.

(f) Upon receipt of such written notice, the chairman of the Council committee(s) shall make reasonable efforts to come in contact with the City department director who has assumed the responsibility of coping with such emergency situation.

(g) The Board of Control is directed to notify and invite all contractors to enter their names on a list with the City if they wish to participate in handling work or supplying material for the City on an emergency basis. A copy of the contractors who will participate is to be registered with the Clerk of Council. (Res. 76-76. Passed 3-1-76.)

105.05 MATERIALS TO BE PURCHASED LOCALLY

In all future contracts for the construction of buildings, structures, or other improvements under the Capital Improvement Budget, the following clause shall be printed or typewritten on each contract:

It is the desire of the City of Canton that all materials used in the construction covered by this contract shall be purchased in the Canton area except such materials which are unavailable in the Canton area.

(Res. 49-77. Passed 2-7-77.)

105.06 MINORITY/WOMEN'S BUSINESS ENTERPRISE CONTRACT PROVISIONS

(a) All contracts with the City shall include the following clause:

The bidder agrees to expend at least \$ _____ of the Contract in the event the contract is awarded to such bidder for minority/women's business enterprises. For purposes of this pledge, the term "minority/women's business enterprise" means a bona fide business established as a sole proprietorship, partnership or corporation owned, operated and controlled by one or more minority persons or women who have at least fifty-one percent (51%) ownership. "Minority" includes African Americans, Asian/Pacific Islanders, Hispanic/Latino Americans and Native American Indians. The minority or woman must have operational and managerial control, interest in capital, and earnings commensurate with the percentage of ownership. Minority/women's business enterprises may be employed as construction contractors, subcontractors, vendors or suppliers.

(Ord. 185-2011. Passed 10-31-11.)

105.07 GRANT AND LOAN APPLICANT REQUIREMENTS

(a) No person, partnership, corporation and/or unincorporated association shall be eligible to receive any grant, loan from Community Development funds or tax incentive, whether administered directly by the Department of Development or indirectly through a program administered by a non-profit agency on behalf of the City, unless the applicant is paid in full or is current and not otherwise delinquent in the payment of any of the following:

- (1) Any outstanding judgments, liens, grant or delinquent loan obligations owed to the City of Canton, any other municipality, township, county, state or federal governmental entity;
- (2) Utility bills for water, sewer and sanitation services owed to the City of Canton;
- (3) Income taxes (to include mandatory wage withholding by employers) owed to the City of Canton, any other municipality, township, county, state or federal governmental entity;
- (4) Real estate taxes and assessments on any properties owned by the applicant;
- (5) Personal property taxes owed to the Stark County Auditor and/or

State of Ohio; or

(6) Any outstanding loans, grants, subsidies or other entitlements received from any federal or state funded Housing and Community Development program.

(b) The applicant shall be required to provide to the City of Canton a notarized statement averring that the applicant is paid in full or is current and not otherwise delinquent in the payment of the obligations listed in subsections (a) (1 - 6).

(c) Falsification of such statement shall result in cancellation of any grant or loan received, and the applicant shall be required to refund any grant or loan funds received.

(d) Council may waive or modify the requirements of this section as applied to a particular applicant if in the interest of justice, and upon consideration of the surrounding circumstances, such waiver or modification is deemed reasonably necessary by Council.

(e) Under any Community Development program in which the combined household income of all members is calculated for the purpose of determining income eligibility of the applicant, no applicant shall be eligible to receive any grant or loan from the Department of Development if any co-applicant or other member of the same household is delinquent in the payment of any of the categories listed in subsection (a) hereof.

(f) Notwithstanding the above, this section shall not apply to any individual, partnership, corporation or incorporated association seeking assistance under a HOME Repair or Emergency Shelter program grant, at the time of the application.

(g) No partnership, corporation or unincorporated association which has as one of its partners, shareholders or owners, any person who is a twenty percent (20%) or greater equity owner in such partnership, corporation or unincorporated association and who is delinquent in any of the categories listed in subsection (a) hereof, shall be eligible for the award of any grant or loan. No person who is a twenty percent (20%) or greater equity owner in any partnership, corporation or unincorporated association which is delinquent in any of the items listed in subsection (a) hereof shall be eligible for the award of any grant or loan.

(h) The Department of Development and any other department which may hereinafter or presently administer the awarding of grants and loans to applicants under any program shall establish guidelines and screen applicants consistent with the foregoing requirements. All City Departments shall comply with the requests of the Department of Development and any other department for information which are made pursuant to this section.

(i) The Department of Development, for programs within its administration and authority, may waive or modify the requirements of this section, under appropriate surrounding circumstances, where a strict interpretation of this section would not further the established goals of the Department.

(Ord. 205-2010. Passed 11-8-10.)

105.08 CAPITAL IMPROVEMENT PROJECTS (REPEALED)

EDITOR'S NOTE: Former Section 105.08 was repealed by Ordinance 86-2009.

105.09 NOTICE AND BIDDING REQUIRED, WHEN

Contracts for the purchase of material, equipment, supplies or services, other than professional or personal services as defined in Section 105.10, which are purchased, leased or constructed at a cost in excess of twenty thousand dollars (\$20,000), and which require bidding pursuant to Ohio R.C. 735.05 through 735.09, and 737.03, shall first be approved by Council, and the contract shall be made with the lowest and best bidder after advertisement for not less than two or more than four consecutive weeks in a newspaper of general circulation within the City.

(Ord. 224-89. Passed 10-2-89; Ord. 52-99. Passed 3-29-99; Ord. 240-2005. Passed 11-21-05.)

105.10 PROFESSIONAL OR PERSONAL SERVICES CONTRACTS

All professional or personal service contracts entered into by any official on behalf of the City shall first be approved and authorized by Council where the contract exceeds fifteen thousand dollars (\$15,000). A professional service or personal service supplier shall be defined as an individual who possesses professional expertise or a specialized skill in the service area, which expertise or skill may vary from one supplier to another. Professional or personal services shall include, but not be limited, to the following: legal, medical, psychological, counseling, accounting, auditing, engineering, architectural, insurance and banking services. A professional or personal service contract shall be considered as one contract where a review of the nature, scope and objective, as well as the interrelationship of time and purpose of the services to be provided under the contract, evidences the undertaking of a single project.

(Ord. 224-89. Passed 10-2-89; Ord. 52-99. Passed 3-29-99.)

105.11 STATE COOPERATIVE PURCHASING WITH ADMINISTRATIVE SERVICES

(a) The City hereby requests authority pursuant to Ohio R.C. 125.04 to participate in State contracts which the Department of Administrative Services, Office of State Purchasing, has entered into for the purchase of supplies, services, equipment and certain materials.

(b) The City hereby agrees to all contract terms and conditions which the Department of Administrative Services, Office of State Purchasing, may prescribe. Such terms and conditions may include a reasonable fee to cover the administrative costs which the Department may incur as a result of the City's participation in contracts.

(c) The Director of Public Service and the Director of Public Safety are hereby authorized to act as the City's authorized agents for the purpose of executing contracts pursuant to the Cooperative Purchasing Act and the City agrees to directly pay vendors under such State contracts in which it participates for items received pursuant to contracts under this program. (Ord. 9-92. Passed

I-27-92.)

(d) The Director of Public Service and the Director of Public Safety may purchase supplies or services from another party, including another political subdivision, instead of through participation in contracts described in subsection (c) hereof if the Director can purchase those supplies or services from the other party upon equivalent terms, conditions, and specifications but at a lower price than the Director can through the Cooperative Purchasing Act. Purchases that a Director makes under this section are exempt from any competitive selection procedures otherwise required by law. A Director who makes any purchase under this section shall maintain sufficient information regarding the purchase to verify that the City satisfied the conditions for making a purchasing under this section.

(Ord. 52-99. Passed 3-29-99.)

105.12 LOCAL BIDDER PREFERENCE

(a) The Board of Control, in determining the lowest and best bidder in the award of contracts, is authorized to award contracts to local bidders as hereinafter defined, whose bid is not more than ten percent (10%) higher, subject to a maximum amount of one hundred thousand dollars (\$100,000.00), than the lowest dollar bid submitted by non-local bidders, provided that the project bid does not exceed ten percent (10%) of the engineer's estimate. The Board of Control's decision in making such an award shall be final.

(Ord. 86-2009. Passed 5-18-09.)

(b) For purposes of this section, "local bidder" means an individual or business entity which at the time of the award of the contract:

(1) Is a resident of the City and/or has its principal place of business in the City; and

(2) Which has filed a City of Canton "Resident" Income Tax Return for the past two tax years.

(c) All contract specifications and/or bid documents that are distributed by Canton for the purpose of soliciting bids for goods and/or services shall contain the following notice:

Prospective bidders will take notice that the City of Canton, in determining the lowest and best bidder in the award of this contract, may award a local bidder preference to any qualified bidder pursuant to Section 105.12 of the Codified Ordinances of the City of Canton. The determination of whether a bidder qualifies for the local preference shall be made by Board of Control. The Board's decision shall be final. A copy of City Code Section 105.12 is attached.

(Ord. 112-97. Passed 6-2-97.)

(d) This section shall be applicable to all contracts for the purchase of material, equipment, supplies or services, which are purchased, leased or constructed at a cost in excess of twenty thousand dollars (\$20,000) and which require bidding pursuant to Ohio R.C. 735.05 through 735.09 and Ohio R.C. 737.03.

(Ord. 112-97. Passed 6-2-97; Ord. 52-99. Passed 3-29-99; Ord. 240-2005. Passed 11-21-05.)

105.13 STATE COOPERATIVE PURCHASING WITH ODOT

(a) The City hereby requests authority pursuant to Ohio R.C. 5513.01 to participate in State contracts which the Ohio Department of Transportation has entered into for the purchase of supplies, services, equipment and certain materials without competitive bidding.

(b) The City hereby agrees to all contract terms and conditions which the Ohio Department of Transportation may prescribe. Such terms and conditions may include a reasonable fee to cover the administrative costs which the Ohio Department of Transportation may incur as a result of the City's participation in contracts.

(c) The Director of Public Service and the Director of Public Safety are hereby authorized to act as the City's authorized agents for the purpose of executing contracts pursuant to the Cooperative Purchasing Act and the City agrees to directly pay vendors under such State contracts in which it participates for items received pursuant to contracts under this program. (Ord. 175-93. Passed 9-13-93.)

(d) The Director of Public Service and the Director of Public Safety may purchase supplies or services from another party, including another political subdivision, instead of through participation in contracts described in subsection (c) hereof if the Director can purchase those supplies or services from the other party upon equivalent terms, conditions and specifications but at a lower price than the Director can through the Cooperative Purchasing Act. Purchases that a Director makes under this section are exempt from any competitive selection procedures otherwise required by law. A Director who makes any purchase under this section shall maintain sufficient information regarding the purchase to verify that the City satisfied the conditions of making a purchase under this section.
(Ord. 52-99. Passed 3-29-99.)

105.14 CHANGE ORDERS TO CONTRACTS

(a) Change orders are amendments to contracts to provide for alterations or modifications of the scope and/or cost of the original contract. A proposed amendment to a contract which is outside the general scope of the original contract does not constitute a change order, but is rather a proposal for a new and separate contract which requires independent contractual authority and bidding, if applicable.

(b) The Director of Public Service and the Director of Public Safety are hereby authorized, without approval of Council, to approve and enter into change orders which do not in the aggregate exceed:

- (1) Ten percent (10%) of the total authorized original contract price; or
- (2) \$100,000.00, whichever is less.

This authority is subject to the availability of funding. Change orders shall additionally require approval of the Board of Control.

(c) Change orders in excess of the aggregate amounts set forth in subsection (b) hereof shall require approval of Council. The above stated

limitations may be amended by Council in any legislation providing for any contract or in any subsequent amending ordinance. (Ord. 31- 2000. Passed 2-14-00.)

ADDITIONAL REQUIREMENTS AND/OR CONDITIONS

- A. Notwithstanding any provisions to contrary, Ohio Law shall govern this Agreement.
- B. Supplier agrees that Canton's specifications and bid documents shall incorporate and made part of any subsequent contract entered by the parties. Further, the terms, conditions and provisions found in Canton's specifications and bid documents shall supersede and control any subsequent contract provisions to the contrary.
- C. Once both parties have fully executed the contract, said contract shall be binding upon the parties' heirs, successors and assigns.
- D. Supplier shall not assign or transfer any interest under this agreement without the express written consent of Canton.
- E. Supplier agrees to indemnify and hold harmless the City of Canton, Ohio, its employees and agents from and against all demands, claims, causes of action, or judgments or omissions by Supplier, its agents, employees or subcontractors. Nothing herein shall be construed to hold Supplier liable for Canton's negligence.
- F. Supplier's liability to the City of Canton for default shall not be limited and the City if Canton shall be entitled to all damages permitted under Ohio law upon Supplier's breach, default or non-performance under this Agreement.
- G. A waiver of a breach of any of the terms or conditions of the contract will not be construed as a waiver of any subsequent breach. Any consent to delay in the performance of contractor of any obligation shall be applicable only to the particular transaction to which it relates, and it shall not be applicable to any other obligation or transaction. Delay in the enforcement of any remedy in the event if a breach of any term or condition of the contract or in the exercise by either party of any right under the contract shall not be construed as a waiver.
- H. When, during the course of construction, it appears to the contractor that any work does not conform to the provisions of the contract documents, it will make necessary corrections so that such work will conform. Additionally, the Contractor will correct any defects caused by faulty materials, equipment or workmanship in work supervised by the Contractor or by a subcontractor. This shall apply to the Contractor or any subcontractor appearing within one year from the date of issuance of a certificate of substantial completion or within such longer periods as prescribed by law or by applicable special guarantees or warranties in the contract documents.
- I. The owner reserves the right to order work changes in the nature of additions, deletions, or modifications, without invalidating the contract, and agrees to make corresponding adjustments in the contract price and time of termination if necessary. The Owner will authorize all changes by a written change order signed by the owner, or the architect of other designee of the owner. The change order will be include conforming changes in the contract and termination time.
- J. Work changed, and the contract price and termination time modified only as set out in the written change order. Any adjustment in the contract sum resulting in a credit or a charge to the owner will determined by mutual agreement of the parties before starting any work involved in the change work.

NOTICE OF WITHDRAWAL

PLEASE NOTE THAT BY SUBMITTING YOUR BID(S) TO THE CITY OF CANTON, THE CITY ASSUMES THAT SAID BID(S) HAS/HAVE BEEN REVIEWED BY AN AUTHORIZED REPRESENTATIVE OF YOUR COMPANY TO ASSURE THAT THE BID(S) IS/ARE CORRECT AND/OR ACCURATE.

ANY BIDDER MAY WITHDRAW THE BID(S), BY WRITTEN REQUEST, AT ANY TIME PRIOR TO THE HOUR SET FOR THE BID OPENING.

IF THERE IS NO WITHDRAWAL OF THE BID(S), IN ACCORDANCE WITH THE ABOVE PROCEDURE, THE CITY RESERVES THE RIGHT TO ENFORCE SAID BID PRICE(S) AND/OR CONTRACT.

ARTICLES OF INCORPORATION

UNLESS THE BIDDER SUBMITS, WITH ITS BID, THE “ARTICLES OF INCORPORATION” SHOWING EXACTLY WHAT NAME YOU ARE INCORPORATED UNDER WITH THE STATE OF OHIO, CANTON MEY REQUEST THE BIDDER PROVIDE THIS INFORMATION.

THE ARTICLES OF INCORPORATION ARE THE DOCUMENTS FILED WITH THE STATE (OHIO OR OTHERWISE) CREATING THE CORPORATE ENTITY.

APPENDIX

A

Prevailing Wages

This project will utilize Ohio Prevailing Wage Rates.

APPENDIX A

AFFIDAVIT OF COMPLIANCE

PREVAILING WAGES

I _____,
(Name of person signing affidavit) (Title)

do hereby certify that the wages paid to all employees of the _____
(Company Name)

for all hours worked on the _____
(Project and Location)

project, during the period from _____ to _____
(Project Dates)

are in compliance with State prevailing wage requirements.

I further certify that no rebates or deductions have been or will be made, directly or indirectly, from any wages paid in connection with this project, other than those provided by law.

(Signature of Officer or Agent)

Sworn to and subscribed in my presence this _____ day of _____, 20 _____.

(Notary Public)

The above affidavit must be executed and sworn to by the officer or agent of the Contractor or Subcontractor who supervises the payment of employees. This affidavit must be submitted to the owner (public authority) before the surety is released or final payment due under the terms of the Contract is made.

WEEKLY PAYROLLS

Each week as work progresses the Contractor must submit to the Owner a copy of all weekly payrolls and required attachments stipulated therein.

All weekly payrolls shall contain or have attached the following:

- A) Name of each employee. Also show address when employee is first entered on payrolls and whenever his address changes thereafter.
- B) Classification of employees (same as shown on wage determination or provisional approval).
- C) Rate of pay not less than that shown on the wage determination.
- D) Hours worked each day and total for each week for each employee.
- E) All deductions made.
- F) Net amount paid employee.
- G) The following certification:

"I certify that the payroll is correct and complete, that the wage rates contained therein are not less than the applicable rates contained in the Wage Determination decision of the Department of Industrial Relations, Prevailing Wage Rate Division, State of Ohio, and that the classifications set forth for each laborer or mechanic conform with the work he performs".

(SIGNATURE)

(TITLE)

Prevailing Wage Rate Skilled Crafts

Name of Union: Asbestos Local 84 Heat & Frost Insulators

Change # : LCN01-2013fbLoc84

Craft : Asbestos Worker Effective Date : 07/01/2013 Last Posted : 02/13/2013

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Asbestos Insulation Worker	\$29.70		\$6.30	\$6.77	\$0.25	\$0.00	\$2.75	\$0.00	\$0.00	\$0.00	\$45.77	\$60.62
Apprentice	Percent											
1st Year	50.00	\$14.85	\$6.30	\$6.77	\$0.30	\$0.00	\$2.75	\$0.00	\$0.00	\$0.00	\$30.97	\$38.39
2nd Year	60.00	\$17.82	\$6.30	\$6.77	\$0.30	\$0.00	\$2.75	\$0.00	\$0.00	\$0.00	\$33.94	\$42.85
3rd Year	70.00	\$20.79	\$6.30	\$6.77	\$0.30	\$0.00	\$2.75	\$0.00	\$0.00	\$0.00	\$36.91	\$47.30
4th Year	80.00	\$23.76	\$6.30	\$6.77	\$0.30	\$0.00	\$2.75	\$0.00	\$0.00	\$0.00	\$39.88	\$51.76

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

3 Journeymen to 1 Apprentice per shop

Jurisdiction (* denotes special jurisdictional note) :

ASHLAND, ASHTABULA*, CARROLL, COLUMBIANA, COSHOCTON, ERIE*, HARRISON, HOLMES, MAHONING, MEDINA, PORTAGE, RICHLAND, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, WAYNE

Special Jurisdictional Note : Ashtabula County: except for the townships of Ashtabula,

Austinburg, Geneva, Harpersfield, Jefferson, Plymouth and Saybrook. Erie except Sandusky city limits.

Details :

The removal of all insulation materials, whether they contain asbestos or not, from mechanical systems (pipes, boilers, ducts, flues, breaching, etc.) is recognized as being the exclusive work of the Asbestos Workers.

On all mechanical systems (pipes, boilers, ducts, flues, breaching, etc.) that are going to be demolished, the removal of all insulating materials whether they contain asbestos or not shall be the exclusive work of the Laborers.

Prevailing Wage Rate Skilled Crafts

Name of Union: Asbestos Local 207 OH

Change # : LCN01-2013fbLoc207OH

Craft : Asbestos Worker Effective Date : 08/07/2013 Last Posted : 08/07/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Asbestos Abatement	\$24.50	\$6.50	\$5.30	\$0.65	\$0.00	\$0.00	\$0.05	\$0.00	\$0.05	\$37.05	\$49.30
Trainee	\$15.85	\$6.50	\$1.25	\$0.65	\$0.00	\$0.00	\$0.05	\$0.00	\$0.05	\$24.35	\$32.27

Special Calculation Note :

Ratio :

3 Journeymen to 1 Trainee

Jurisdiction (* denotes special jurisdictional note) :

- ADAMS, ASHLAND, ASHTABULA*, ATHENS,
- AUGLAIZE, BROWN, BUTLER*, CARROLL,
- CHAMPAIGN, CLARK, CLERMONT, CLINTON,
- COLUMBIANA, COSHOCTON, CRAWFORD,
- CUYAHOGA, DARKE, DELAWARE, FAIRFIELD,
- FAYETTE, FRANKLIN, GEAUGA, GREENE,
- GUERNSEY, HAMILTON, HARDIN, HARRISON,
- HIGHLAND, HOCKING, HOLMES, HURON,
- KNOX, LAKE, LICKING, LOGAN, LORAIN,
- MADISON, MAHONING, MARION, MEDINA,
- MIAMI, MONTGOMERY, MORGAN, MORROW,
- MUSKINGUM, NOBLE, PERRY, PICKAWAY,
- PORTAGE, PREBLE, RICHLAND, ROSS,

SHELBY, STARK, SUMMIT, TRUMBULL,
TUSCARAWAS, UNION, VINTON, WARREN*,
WAYNE

Special Jurisdictional Note : Butler County:(townships of Fairfield,Hanover,Liberty,Milford,Morgan,Oxford,Ripley,Ross,StClair,Union & Wayne.) (Lemon & Madison) Warren County: (townships of: Deerfield, Hamilton, Harlan, Salem, Union & Washington). (Clear Creek, Franklin, Mossie, Turtle Creek & Wayney). Ashtabula County: (post offices & townships of Ashtabula, Austinburg, Geneva, Harperfield, Jefferson, Plymouth & Saybrook) (townships of Andover, Cherry Valley, Colbrook, Canneaut, Denmark, Dorset, East Orwell, Hartsgrove, Kingville, Lenox, Monroe,Morgan,New Lyme,North Kingsville, Orwell, Pierpoint, Richmond Rock Creek, Rome, Sheffield, Trumbull, Wayne, Williamsfield & Windsor) Erie County: (post offices & townships of Berlin, Berlin Heights,Birmingham,Florence ,Huron, Milan, Shinrock & Vermilion)

Details :

Asbestos & lead paint abatement including, but not limited to the removal or encapsulation of asbestos & lead paint, all work in conjunction with the preparation of the removal of same & all work in conjunction with the clean up after said removal. The removal of all insulation materials, whether they contain asbestos or not, from mechanical systems (pipes, boilers, ducts, flues, breaching, etc.) is recognized as being the exclusive work of the Asbestos Abatement Workers.

On all mechanical systems (pipes, boilers, ducts, flues, breaching, etc.) that are going to be demolished, the removal of all insulating materials whether they contain asbestos or not shall be the exclusive work of the Laborers.

An Abatement Journeyman is anyone who has more than 300 hours in the Asbestos Abatement field.

Prevailing Wage Rate Skilled Crafts

Name of Union: **Boilermaker Local 744**

Change # : CN01-2008Loc744

Craft : Boilermaker Effective Date : 07/01/2009 Last Posted : 06/30/2010

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Boilermaker	\$36.84	\$6.82	\$6.46	\$0.35	\$0.00	\$3.75	\$0.00			\$54.22	\$72.64
Apprentice	Percent										
1st 6 months	70.00	\$25.79	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$42.92	\$55.81
2nd 6 months	72.52	\$26.72	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$43.85	\$57.20
3rd 6 months	75.00	\$27.63	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$44.76	\$58.58
4th 6 months	77.51	\$28.55	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$45.68	\$59.96
5th 6 months	80.02	\$29.48	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$46.61	\$61.35
6th 6 months	85.00	\$31.31	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$48.44	\$64.10
7th 6 months	90.00	\$33.16	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$50.29	\$66.86
8th 6 months	95.02	\$35.01	\$6.62	\$6.46	\$0.30	\$0.00	\$3.75	\$0.00		\$52.14	\$69.64
Helper	60.00	\$22.10	\$6.82	\$6.46	\$0.35	\$0.00	\$3.75	\$0.00		\$39.48	\$50.54

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio : **Jurisdiction (* denotes special**

5 Journeymen to 1 Apprentice to 1 Helper

jurisdictional note) :

ASHTABULA, CARROLL, COSHOCTON,
CUYAHOGA, GEAUGA, HARRISON,
HOLMES, LAKE, LORAIN, MAHONING,
MEDINA, PORTAGE, STARK, SUMMIT,
TRUMBULL, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Bricklayer Local 6 Tile Setters & Finishers

Change # : LCN1-2012jcLoc6

Craft : Bricklayer Effective Date : 05/02/2012 Last Posted : 05/02/2012

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Bricklayer Tile Setter	\$23.89	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$33.65	\$45.60
Marble Mason	\$23.89	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$33.65	\$45.60
Terrazzo worker	\$23.89	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$33.65	\$45.60
Finisher Support	\$21.28	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$31.04	\$41.68
APPRENTICE Finisher Support Only											
1ST 6 months	\$12.77	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$22.53	\$28.92
2ND 6 months	\$14.90	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$24.66	\$32.11
3RD 6 months	\$15.96	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$25.72	\$33.70
4TH 6 months	\$17.02	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$26.78	\$35.29
5TH 6 months	\$18.09	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$27.85	\$36.89
6TH 6 months	\$19.15	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$28.91	\$38.49
Apprentice	Percent										
1st 30 Days	35.00	\$8.36	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$18.12	\$22.30
31st day thru 1st 6 months	40.00	\$9.56	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$19.32	\$24.09
2nd 6 months	45.00	\$10.75	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$20.51	\$25.89
3rd 6 months	50.00	\$11.95	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$21.71	\$27.68
4th 6 months	58.00	\$13.86	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$23.62	\$30.54
5th 6 months	65.00	\$15.53	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$25.29	\$33.05
6th 6 months	75.00	\$17.92	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$27.68	\$36.64
7th 6 months	81.00	\$19.35	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$29.11	\$38.79

8th 4 months	90.00	\$21.50	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$31.26	\$42.01

Special Calculation Note : Classification title contains "Bricklayer" because contract originates within the Bricklayer Local.

Note that the classification description is clarified after the local union number at the top of the page.

Ratio :

5 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COLUMBIANA, COLUMBIANA*, STARK, TUSCARAWAS

Special Jurisdictional Note : Tile Setter Work for Townships of Butler, Hanover, Knox, and West in Columbiana County

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: **Bricklayer Local 6**

Change # : LCN01-2013fbLoc6

Craft : Bricklayer Effective Date : 05/01/2013 Last Posted : 04/24/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Bricklayer	\$26.10		\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.63	\$50.68
Pointer Caulker Cleaner	\$26.10		\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.63	\$50.68
Stone Mason	\$26.10		\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.63	\$50.68
Cement Mason	\$26.10		\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.63	\$50.68
Plaster	\$26.10		\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.63	\$50.68
Apprentice	Percent											
1st 4 months	50.00	\$13.05	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$24.58	\$31.11
2nd 4 months	55.00	\$14.36	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$25.89	\$33.06
3rd 4 months is 1st year	60.00	\$15.66	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$27.19	\$35.02
4th 4 months	65.02	\$16.97	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$28.50	\$36.99
5th 4 months	70.00	\$18.27	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$29.80	\$38.94
6th 4 months is 2nd year	75.00	\$19.58	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$31.11	\$40.89
24 through 36 months	80.00	\$20.88	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$32.41	\$42.85

is 3rd year												
36 through 48 months is 4th year	90.00	\$23.49	\$5.43	\$5.60	\$0.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$35.02	\$46.77

Special Calculation Note : OTHER IS :INTERNATIONAL MASONRY INSTITUTE

Ratio :

3 Journeymen to 1 Apprentice
 8 Journeymen to 2 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COLUMBIANA*, STARK, TUSCARAWAS

Special Jurisdictional Note : In Columbiana County the following townships are included: (Knox, West, Butler, and Hanover)

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Bricklayer Local 8 Tile Finisher

Change # : LCN01-2013fbLoc8

Craft : Bricklayer Effective Date : 07/24/2013 Last Posted : 07/24/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Bricklayer Tile Marble Terrazzo Finisher	\$23.14		\$4.85	\$7.48	\$0.20	\$0.00	\$0.34	\$0.40	\$0.00	\$0.00	\$36.41	\$47.98
Resilient flooring Wood Laminate Carpet Carpet Tile Finisher	\$12.39		\$4.85	\$6.88	\$0.25	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$24.37	\$30.57
New Employees	Percent											
1st 30 days	60.00	\$13.88	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$13.88	\$20.83
2nd 30 days thru 6 months	60.00	\$13.88	\$4.85	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$18.73	\$25.68
2nd 6 months	70.00	\$16.20	\$4.85	\$7.48	\$0.20	\$0.00	\$0.34	\$0.40	\$0.00	\$0.00	\$29.47	\$37.57
3rd 6 months	75.00	\$17.35	\$4.85	\$7.48	\$0.20	\$0.00	\$0.34	\$0.40	\$0.00	\$0.00	\$30.62	\$39.30
4th 6 months	80.00	\$18.51	\$4.85	\$7.48	\$0.20	\$0.00	\$0.34	\$0.40	\$0.00	\$0.00	\$31.78	\$41.04
5th 6 months	85.00	\$19.67	\$4.85	\$7.48	\$0.20	\$0.00	\$0.34	\$0.40	\$0.00	\$0.00	\$32.94	\$42.77

6th 6 months	90.00	\$20.39	\$4.85	\$7.46	\$0.60	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$33.64	\$43.84
7th 6 months	95.00	\$21.53	\$4.85	\$7.46	\$0.60	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$34.78	\$45.54
8th 6 months	95.00	\$21.53	\$4.85	\$7.46	\$0.60	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$34.78	\$45.54

Special Calculation Note : Classification title contains "Bricklayer" because contract originates within the Bricklayer Local.

Note that the classification description is clarified after the local union number at the top of the page.

Ratio :

Jurisdiction (* denotes special jurisdictional note) :

ASHTABULA, CARROLL, COLUMBIANA, COSHOCTON, HARRISON, HOLMES, JEFFERSON, MAHONING, PORTAGE, STARK, TRUMBULL, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Mechanic's assistants shall do all the handling, of sand, cement, lime, tile, marble, terrazzo and other materials used by the mechanics upon being delivered to the building or at the job. Hand rubbing, rolling, mixing, formulating, grinding, grouting, and cleaning of all marble, tile, mosaic, and terrazzo floors, and wainscoting, and such other work as is required in helping a mechanic as is the established custom of the trade. No limit to the tools, equipment or machinery used.

Prevailing Wage Rate Skilled Crafts

Name of Union: Bricklayer Local 8 Zone 2 Tile Setters & Finishers

Change # : LCN1-2013fbLoc6

Craft : Bricklayer Effective Date : 07/24/2013 Last Posted : 07/24/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Bricklayer Tile Setter	\$24.07	\$4.65	\$4.74	\$0.20	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$34.01	\$46.05
Marble Mason	\$24.07	\$4.65	\$4.74	\$0.20	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$34.01	\$46.05
Terrazzo worker	\$24.07	\$4.65	\$4.74	\$0.20	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$34.01	\$46.05
Finisher Support	\$21.46	\$4.65	\$4.74	\$0.20	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$31.40	\$42.13
APPRENTICE Finisher Support Only											
1ST 6 months	\$12.77	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$22.88	\$29.27
2ND 6 months	\$14.90	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$25.01	\$32.46
3RD 6 months	\$15.96	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$26.07	\$34.05
4TH 6 months	\$17.02	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$27.13	\$35.64
5TH 6 months	\$18.09	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$28.20	\$37.25
6TH 6 months	\$19.15	\$4.55	\$4.66	\$0.55	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$29.26	\$38.84
Apprentice	Percent										
1st 30 Days	60.00	\$14.44	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$14.44	\$21.66
31st day thru 1st 6 months	60.00	\$14.44	\$4.65	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$19.09	\$26.31
2nd 6 months	70.00	\$16.85	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$26.79	\$35.21
3rd 6 months	75.00	\$18.05	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$27.99	\$37.02
4th 6 months	80.00	\$19.26	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$29.20	\$38.82
5th 6 months	85.00	\$20.46	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$30.40	\$40.63
6th 6 months	90.00	\$21.66	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$31.60	\$42.43
7th 6 months	95.00	\$22.87	\$4.65	\$4.74	\$0.20	\$0.00	\$0.35	\$0.00	\$0.00	\$32.81	\$44.24

8th 4 months	95.00	\$22.87	\$4.65	\$4.74	\$0.20	\$0.00	\$0.00	\$0.35	\$0.00	\$0.00	\$32.81	\$44.24

Special Calculation Note : Other \$0.35 is for Internatioanl Masonry training. Classification title contains "Bricklayer" because contract originates within the Bricklayer Local. Note that the classification description is clarified after the local union number at the top of the page.

Ratio :

4 Journeymen to 1 Apprentice
 6 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COLUMBIANA, COLUMBIANA*,
 STARK, TUSCARAWAS

Special Jurisdictional Note : Tile Setter Work for Townships of Butler, Hanover, Knox, and West in Columbiana County

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter & Floorlayer NE District C

Change # : LCN02-2012fbLocNEdistCantonC

Craft : **Carpenter** Effective Date : **09/26/2012** Last Posted : **09/26/2012**

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Carpenter	\$25.38		\$6.45	\$4.69	\$0.45	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$37.31	\$50.00
Floorlayer	\$25.38		\$6.45	\$4.69	\$0.47	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$37.33	\$50.02
Apprentice	Percent											
1st 3 Months	40.00	\$10.15	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$10.15	\$15.23
2nd 3 Months	45.00	\$11.42	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$18.32	\$24.03
2nd 6 Months is 1st year	50.00	\$12.69	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$19.59	\$25.93
3rd 6 Months	55.00	\$13.96	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$20.86	\$27.84
4th 6 Months is 2nd year	60.00	\$15.23	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$22.13	\$29.74
5th 6 Months	70.00	\$17.77	\$6.45	\$3.28	\$0.45	\$0.00	\$0.24	\$0.00	\$0.00	\$0.00	\$28.19	\$37.07
6th 6 Months is 3rd year	75.01	\$19.04	\$6.45	\$3.52	\$0.45	\$0.00	\$0.26	\$0.00	\$0.00	\$0.00	\$29.72	\$39.24
7th 6 Months	80.00	\$20.30	\$6.45	\$3.75	\$0.45	\$0.00	\$0.27	\$0.00	\$0.00	\$0.00	\$31.22	\$41.38
8th 6 Months is 4th year	85.00	\$21.57	\$6.45	\$3.99	\$0.45	\$0.00	\$0.29	\$0.00	\$0.00	\$0.00	\$32.75	\$43.54



Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Extra \$.02 (\$.47) is for Training for Floorlayers and Floorlayers Apprentice.

Ratio :

4 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, STARK, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter Local 509 NE District Interior Systems

Change # : LCN01-2010mmLoc509Int Systems

Craft : Carpenter Effective Date : 06/17/2010 Last Posted : 06/17/2010

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Carpenter Window Shade Venetian Blinds Drapery Installer	\$15.50	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00			\$15.50	\$23.25

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

Jurisdiction (* denotes special jurisdictional note) :
 ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, CUYAHOGA, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FRANKLIN, FULTON, GALLIA, GEauga, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN,

HARRISON, HENRY, HIGHLAND, HOCKING,
HOLMES, HURON, JACKSON, JEFFERSON,
KNOX, LAKE, LAWRENCE, LICKING,
LOGAN, LORAIN, LUCAS, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, OTTAWA,
PAULDING, PERRY, PICKAWAY, PIKE,
PORTAGE, PREBLE, PUTNAM, RICHLAND,
ROSS, SANDUSKY, SCIOTO, SENECA,
SHELBY, STARK, SUMMIT, TRUMBULL,
TUSCARAWAS, UNION, VAN WERT,
VINTON, WARREN, WASHINGTON, WAYNE

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter Millwright Local 1871 NE District J

Change # : LCN03-2012fbLoc1871J

Craft : Carpenter Effective Date : 09/26/2012 Last Posted : 09/26/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Carpenter Millwright	\$25.10		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$38.04	\$50.59
Certified Welder	\$26.10		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$39.04	\$52.09
Lay-Out Man on Monorail	\$26.60		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$39.54	\$52.84
Apprentice	Percent											
1st 6 months	55.00	\$13.81	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$26.75	\$33.65
2nd 6 months	58.50	\$14.68	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$27.62	\$34.97
3rd 6 months	62.00	\$15.56	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$28.50	\$36.28
4th 6 months	65.50	\$16.44	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$29.38	\$37.60
5th 6 months	69.00	\$17.32	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$30.26	\$38.92
6th 6 months	72.50	\$18.20	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$31.14	\$40.24
7th 6 months	76.00	\$19.08	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$32.02	\$41.55
8th 6 months	80.00	\$20.08	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$33.02	\$43.06

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

4 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, STARK, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

If certain projects warrant a larger percentage of apprentices, it will be agreed to increase the ratio of apprentices to journeymen, but Not to exceed (1) Apprentice to (4) Journeymen.

The following classifications will be paid at the amount above Journeyman Rate:

Certified Welder \$1.00

Lay Out Man on Monorail \$1.25

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter NE District Industrial Dock & Door

Change # : LCN01-2010jcCarpNEStatewide

Craft : Carpenter Effective Date : 10/27/2010 Last Posted : 10/27/2010

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Carpenter	\$19.70		\$4.85	\$1.00	\$0.15	\$0.00	\$0.00	\$0.00			\$25.70	\$35.55
Trainee	Percent											
1st Year	60.00	\$11.82	\$4.85	\$1.00	\$0.15	\$0.00	\$0.00	\$0.00			\$17.82	\$23.73
2nd Year	80.20	\$15.80	\$4.85	\$1.00	\$0.15	\$0.00	\$0.00	\$0.00			\$21.80	\$29.70

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

1 Journeymen to 1 Trainee

Jurisdiction (* denotes special jurisdictional note) :

- ADAMS, ALLEN, ASHLAND, ASHTABULA,
- ATHENS, AUGLAIZE, BELMONT, BROWN,
- BUTLER, CARROLL, CHAMPAIGN, CLARK,
- CLERMONT, CLINTON, COLUMBIANA,
- COSHOCTON, CRAWFORD, CUYAHOGA,
- DARKE, DEFIANCE, DELAWARE, ERIE,
- FAIRFIELD, FAYETTE, FRANKLIN, FULTON,
- GALLIA, GEAUGA, GREENE, GUERNSEY,
- HAMILTON, HANCOCK, HARDIN,
- HARRISON, HENRY, HIGHLAND, HOCKING,
- HOLMES, HURON, JACKSON, JEFFERSON,

KNOX, LAKE, LAWRENCE, LICKING,
LOGAN, LORAIN, LUCAS, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, OTTAWA,
PAULDING, PERRY, PICKAWAY, PIKE,
PORTAGE, PREBLE, PUTNAM, RICHLAND,
ROSS, SANDUSKY, SCIOTO, SENECA,
SHELBY, STARK, SUMMIT, TRUMBULL,
TUSCARAWAS, UNION, VAN WERT,
VINTON, WARREN, WASHINGTON, WAYNE,
WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note : Industrial Dock and Door is the installation of overhead doors, roll up doors and dock leveling equipment

Details :

10/27/10 New Contract jc

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter NE Insulation C

Change # : LCN02-2012fbLocNEC

Craft : Carpenter Effective Date : 09/26/2012 Last Posted : 09/26/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Carpenter Insulation	\$20.31		\$6.45	\$4.69	\$0.45	\$0.00	\$0.34	\$0.00	\$0.00	\$0.00	\$32.24	\$42.40
Apprentice	Percent											
1st 3 months	50.00	\$10.16	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$10.16	\$15.23
2nd 3 months	50.00	\$10.16	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$17.05	\$22.13
2nd 6 months	50.00	\$10.16	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$17.05	\$22.13
3rd 6 months	55.00	\$11.17	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$18.07	\$23.66
4th 6 months	60.00	\$12.19	\$6.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$19.09	\$25.18
5th 6 months	70.00	\$14.22	\$6.45	\$3.28	\$0.45	\$0.00	\$0.24	\$0.00	\$0.00	\$0.00	\$24.64	\$31.75
6th 6 months	75.00	\$15.23	\$6.45	\$3.52	\$0.45	\$0.00	\$0.26	\$0.00	\$0.00	\$0.00	\$25.91	\$33.53
7th 6 months	80.00	\$16.25	\$6.45	\$3.75	\$0.45	\$0.00	\$0.27	\$0.00	\$0.00	\$0.00	\$27.17	\$35.29
8th 6 months	85.00	\$17.26	\$6.45	\$3.99	\$0.45	\$0.00	\$0.29	\$0.00	\$0.00	\$0.00	\$28.44	\$37.08

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

2 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, STARK, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter Pile Driver Local 1871 NE District O

Change # : LCN02-2012fbLoc1871O

Craft : Carpenter Effective Date : 09/26/2012 Last Posted : 09/26/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Carpenter Pile Driver	\$24.85		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$37.79	\$50.22
Diver	\$37.28		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$50.22	\$68.86
Certified Welder	\$25.90		\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$38.84	\$51.79
Apprentice	Percent											
1st 6 months	55.00	\$13.67	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$26.61	\$33.44
2nd 6 months	58.50	\$14.54	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$27.48	\$34.75
3rd 6 months	62.00	\$15.41	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$28.35	\$36.05
4th 6 months	65.50	\$16.28	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$29.22	\$37.36
5th 6 months	69.00	\$17.15	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$30.09	\$38.66
6th 6 months	72.50	\$18.02	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$30.96	\$39.96
7th 6 months	76.00	\$18.89	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$31.83	\$41.27
8th 6 months	80.00	\$19.88	\$6.45	\$4.42	\$0.45	\$0.00	\$1.62	\$0.00	\$0.00	\$0.00	\$32.82	\$42.76

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

4 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

STARK, WAYNE, CARROLL, TUSCARAWAS

Special Jurisdictional Note :

Details :

If certain projects warrant a larger percentage of apprentices, it will be agreed to increase the ratio of apprentices to journeymen, but Not to exceed (1) Apprentice to (2) Journeymen.

Employees working with creosoted, chemically treated or toxic materials, shall receive \$.50 above regular rate.

Prevailing Wage Rate Skilled Crafts

Name of Union: Carpenter Statewide Office Systems

Change # : LCR02-2010jcJurSTWIDEOfficeSystems

Craft : Carpenter Effective Date : 07/28/2010 Last Posted : 07/28/2010

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate																																																																																																																																																																																																																																				
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)																																																																																																																																																																																																																																			
Classification																																																																																																																																																																																																																																															
Carpenter Installers	\$16.00		\$5.47	\$1.00	\$0.08	\$0.00	\$0.00	\$0.00			\$22.55	\$30.55																																																																																																																																																																																																																																			
Helper	\$9.50		\$5.47	\$0.00	\$0.08	\$0.00	\$0.00	\$0.00			\$15.05	\$19.80																																																																																																																																																																																																																																			
<table border="1" style="width: 100%; border-collapse: collapse;"> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td><td> </td></tr> </table>																																																																																																																																																																																																																																															
Installer Trainee	Percent																																																																																																																																																																																																																																														
1st 6 months	59.40	\$9.50	\$5.47	\$0.00	\$0.08	\$0.00	\$0.00	\$0.00			\$15.05	\$19.81																																																																																																																																																																																																																																			
2nd 6 Months	62.00	\$9.92	\$5.47	\$0.00	\$0.08	\$0.00	\$0.00	\$0.00			\$15.47	\$20.43																																																																																																																																																																																																																																			
3rd 6 Months	65.00	\$10.40	\$5.47	\$0.00	\$0.08	\$0.00	\$0.00	\$0.00			\$15.95	\$21.15																																																																																																																																																																																																																																			
4th 6 Months	67.95	\$10.87	\$5.47	\$0.79	\$0.08	\$0.00	\$0.00	\$0.00			\$17.21	\$22.65																																																																																																																																																																																																																																			
5th 6 months	70.95	\$11.35	\$5.47	\$0.83	\$0.08	\$0.00	\$0.00	\$0.00			\$17.73	\$23.41																																																																																																																																																																																																																																			
6th 6 Months	73.90	\$11.82	\$5.47	\$0.86	\$0.08	\$0.00	\$0.00	\$0.00			\$18.23	\$24.15																																																																																																																																																																																																																																			
7th 6 Months	76.90	\$12.30	\$5.47	\$0.90	\$0.08	\$0.00	\$0.00	\$0.00			\$18.75	\$24.91																																																																																																																																																																																																																																			
8th 6 Months	79.85	\$12.78	\$5.47	\$0.93	\$0.08	\$0.00	\$0.00	\$0.00			\$19.26	\$25.64																																																																																																																																																																																																																																			
9th 6 months	82.80	\$13.25	\$5.47	\$1.00	\$0.08	\$0.00	\$0.00	\$0.00			\$19.80	\$26.42																																																																																																																																																																																																																																			

Special Calculation Note : Helper H&W after 90 days probationary period

Ratio :

1 Installer to 1 Trainee or 1 Helper

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, CUYAHOGA, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GEAUGA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, HURON, JACKSON, JEFFERSON, KNOX, LAKE, LAWRENCE, LICKING, LOGAN, LORAIN, LUCAS, MADISON, MAHONING, MARION, MEDINA, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PORTAGE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note :**Details :**

Office systems is defined as modular systems with demountable units such as desks, partitions and shelving. All work in connection with the assembly, reconfiguration and repair of all work in the office system field.

INSTALLER: is defined as a qualified office systems mechanic capable of laying out, estimating and installing various office system manufactured products.

INSTALL TRAINEE: is defined as a person training in the estimating, layout and installation in all facets of the office systems industry. An installer trainee will work to assist an installer or lead installer in all installations. He is NOT permitted to work without the assistance of lead installer

INSTALL HELPER: is defined as a person who assists in the delivery, staging and clean up of related office system work. He is NOT to be involved with the installation or layout of work related to office systems.

Receiving, unloading, unpacking, & removal of rubbish shall be done by install helpers.

Prevailing Wage Rate Skilled Crafts

Name of Union: Cement Mason & Plasterer Local 109

Change # : LCN01-2012jcLoc109

Craft : Cement Effective Date : 01/19/2012 Last Posted : 01/19/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Cement Mason	\$27.04		\$6.05	\$4.00	\$0.00	\$0.00	\$3.50	\$0.00	\$0.00	\$0.00	\$40.59	\$54.11
Plasterer	\$27.18		\$6.25	\$4.00	\$0.35	\$0.00	\$3.25	\$0.00	\$0.00	\$0.00	\$41.03	\$54.62
Apprentice Cement Mason	Percent											
1st year	60.00	\$16.22	\$6.05	\$4.00	\$0.00	\$0.00	\$3.50	\$0.00	\$0.00	\$0.00	\$29.77	\$37.89
2nd year	75.00	\$20.28	\$6.05	\$4.00	\$0.00	\$0.00	\$3.50	\$0.00	\$0.00	\$0.00	\$33.83	\$43.97
3rd year	90.00	\$24.34	\$6.05	\$4.00	\$0.00	\$0.00	\$3.50	\$0.00	\$0.00	\$0.00	\$37.89	\$50.05
Plasterer Apprentice												
1st year	60.17	\$16.27	\$6.25	\$4.00	\$0.35	\$0.00	\$3.25	\$0.00	\$0.00	\$0.00	\$30.12	\$38.25
2nd year	70.25	\$19.00	\$6.25	\$4.00	\$0.35	\$0.00	\$3.25	\$0.00	\$0.00	\$0.00	\$32.85	\$42.34
3rd year	80.32	\$21.72	\$6.25	\$4.00	\$0.35	\$0.00	\$3.25	\$0.00	\$0.00	\$0.00	\$35.57	\$46.43
4th year	90.43	\$24.45	\$6.25	\$4.00	\$0.35	\$0.00	\$3.25	\$0.00	\$0.00	\$0.00	\$38.30	\$50.53

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

1 Journeymen to 1 Apprentice
5 Journeymen to 2 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, HOLMES, MEDINA, PORTAGE,
STARK, SUMMIT, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Finishers when applying colorshake shall be paid an additional \$2.00 per DAY.

Swing Scaffolds up to 50 feet shall be paid \$0.25 above the Journeymen rate.

Swing Scaffolds over 50 feet shall be paid \$0.35 above the Journeymen rate.

Prevailing Wage Rate Skilled Crafts

Name of Union: Cement Mason Bricklayer Local 97 HevHwy A

Change # : LCN01-2013fbHvyHwy

Craft : Bricklayer Effective Date : 06/01/2013 Last Posted : 05/29/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Cement Mason Bricklayer Sewer Water Treatment A	\$27.80		\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$39.10	\$53.00
Apprentice	Percent											
1st year	50.00	\$13.90	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$25.20	\$32.15
2nd year	70.00	\$19.46	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$30.76	\$40.49
3rd year	90.00	\$25.02	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$36.32	\$48.83

Special Calculation Note : NOT FOR BUILDING CONSTRUCTION.

Ratio :

- 3 Journeymen to 1 Apprentice
- 6 Journeymen to 2 Apprentice
- 9 Journeymen to 2 Apprentice
- 12 Journeymen to 4 Apprentice
- 15 Journeymen to 5 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

- ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, CUYAHOGA, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON,

GALLIA, GEAUGA, GREENE, GUERNSEY,
HAMILTON, HANCOCK, HARDIN,
HARRISON, HENRY, HIGHLAND, HOCKING,
HOLMES, HURON, JACKSON, JEFFERSON,
KNOX, LAKE, LAWRENCE, LICKING,
LOGAN, LORAIN, LUCAS, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, OTTAWA,
PAULDING, PERRY, PICKAWAY, PIKE,
PORTAGE, PREBLE, PUTNAM, RICHLAND,
ROSS, SANDUSKY, SCIOTO, SENECA,
SHELBY, STARK, SUMMIT, TRUMBULL,
TUSCARAWAS, UNION, VAN WERT,
VINTON, WARREN, WASHINGTON, WAYNE

Special Jurisdictional Note :

Details :

(A) Highway Construction, Sewer, Waterworks And Utility Construction, Industrial & Building Site Heavy Construction, Airport Construction Or Railroad Construction Work.

(B) Power Plant, Tunnels, Amusement Park, Athletic Stadium Site Work ,Pollution Control,Sewer Plant, Waste Plant, & Water Treatment Facilities, Construction.

Prevailing Wage Rate Skilled Crafts

Name of Union: Cement Mason Bricklayer Local 97 HevHwy B

Change # : LCN01-2013fbHvyHwy

Craft : Bricklayer Effective Date : 06/01/2013 Last Posted : 05/29/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Cement Mason Bricklayer Power Plants Tunnels Amusement Parks B	\$28.80		\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$40.10	\$54.50
Apprentice	Percent											
1st year	50.00	\$14.40	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$25.70	\$32.90
2nd year	70.00	\$20.16	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$31.46	\$41.54
3rd year	90.00	\$25.92	\$6.90	\$4.00	\$0.40	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$37.22	\$50.18

Special Calculation Note : NOT FOR BUILDING CONSTRUCTION.

Ratio :

- 3 Journeymen to 1 Apprentice
- 6 Journeymen to 2 Apprentice
- 9 Journeymen to 2 Apprentice
- 12 Journeymen to 4 Apprentice
- 15 Journeymen to 5 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

- ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, CUYAHOGA, DARKE, DEFIANCE, DELAWARE, ERIE,

FAIRFIELD, FAYETTE, FRANKLIN, FULTON,
GALLIA, GEAUGA, GREENE, GUERNSEY,
HAMILTON, HANCOCK, HARDIN,
HARRISON, HENRY, HIGHLAND, HOCKING,
HOLMES, HURON, JACKSON, JEFFERSON,
KNOX, LAKE, LAWRENCE, LICKING,
LOGAN, LORAIN, LUCAS, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, OTTAWA,
PAULDING, PERRY, PICKAWAY, PIKE,
PORTAGE, PREBLE, PUTNAM, RICHLAND,
ROSS, SANDUSKY, SCIOTO, SENECA,
SHELBY, STARK, SUMMIT, TRUMBULL,
TUSCARAWAS, UNION, VAN WERT,
VINTON, WARREN, WASHINGTON, WAYNE

Special Jurisdictional Note :

Details :

(A) Highway Construction, Sewer, Waterworks And Utility Construction, Industrial & Building Site Heavy Construction, Airport Construction Or Railroad Construction Work.

(B) Power Plant, Tunnels, Amusement Park, Athletic Stadium Site Work ,Pollution Control,Sewer Plant, Waste Plant, & Water Treatment Facilities, Construction.

Prevailing Wage Rate Skilled Crafts

Name of Union: Cement Mason Local 132 HvyHwy District II (A)

Change # : LCN01-2013fbHvyHwy

Craft : Cement Mason Effective Date : 07/24/2013 Last Posted : 07/24/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Cement Mason (A)	\$26.43		\$6.69	\$5.00	\$0.50	\$0.00	\$2.10	\$0.00	\$0.00	\$0.00	\$40.72	\$53.93
Apprentice	Percent											
1st Year	60.00	\$15.86	\$6.69	\$5.00	\$0.50	\$0.00	\$2.10	\$0.00	\$0.00	\$0.00	\$30.15	\$38.08
2nd Year	75.00	\$19.82	\$6.69	\$5.00	\$0.50	\$0.00	\$2.10	\$0.00	\$0.00	\$0.00	\$34.11	\$44.02
3rd Year	90.00	\$23.79	\$6.69	\$5.00	\$0.50	\$0.00	\$2.10	\$0.00	\$0.00	\$0.00	\$38.08	\$49.97

Special Calculation Note : Work performed in accordance with detail (B) please see Cement Mason HvyHwy District 1 (B) wage sheet

Ratio :

2 Journeymen to 1 Apprentice
Company Wide

Jurisdiction (* denotes special jurisdictional note) :

- BROWN, BUTLER, CLERMONT,
- COLUMBIANA, DEFIANCE, ERIE,
- HAMILTON, HIGHLAND, HURON, LORAIN,
- MAHONING, MEDINA, OTTAWA,
- PAULDING, PORTAGE, SANDUSKY,
- SENECA, STARK, SUMMIT, TRUMBULL,
- WARREN, WILLIAMS

Special Jurisdictional Note :

Details :

(A) Highway Construction, Sewer, Waterworks And Utility Construction, Industrial & Building Site, Heavy Construction, Airport Construction Or Railroad Construction Work.

(B) Power Plant, Tunnels, Amusement Park, Athletic Stadium Site Work ,Pollution Control,Sewer Plant, Waste Plant, & Water Treatment Facilities, Construction.

Prevailing Wage Rate Skilled Crafts

Name of Union: Cement Mason Local 132 HvyHwy District II (B)

Change # : LCN01-2013fbHvyHwy

Craft : Cement Mason Effective Date : 07/24/2013 Last Posted : 07/24/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Cement Mason (B)	\$27.30	\$6.69	\$5.00	\$0.50	\$0.00	\$2.10	\$0.00	\$0.00	\$0.00	\$41.59	\$55.24
Apprentice	Percent										
1st Year	60.00	\$16.38	\$6.69	\$5.00	\$0.50	\$2.10	\$0.00	\$0.00	\$0.00	\$30.67	\$38.86
2nd Year	75.00	\$20.48	\$6.69	\$5.00	\$0.50	\$2.10	\$0.00	\$0.00	\$0.00	\$34.77	\$45.00
3rd Year	90.00	\$24.57	\$6.69	\$5.00	\$0.50	\$2.10	\$0.00	\$0.00	\$0.00	\$38.86	\$51.15

Special Calculation Note : Work performed in accordance with detail (A) please see Cement Mason HvyHwy District 1 (A) wage sheet

Ratio :

2 Journeymen to 1 Apprentice
Company Wide

Jurisdiction (* denotes special jurisdictional note) :

- BROWN, BUTLER, CLERMONT,
- COLUMBIANA, DEFIANCE, ERIE,
- HAMILTON, HIGHLAND, HURON, LORAIN,
- MAHONING, MEDINA, OTTAWA,
- PAULDING, PORTAGE, SANDUSKY,
- SENECA, STARK, SUMMIT, TRUMBULL,
- WARREN, WILLIAMS

Special Jurisdictional Note :

Details :

(A) Highway Construction, Sewer, Waterworks And Utility Construction, Industrial & Building Site, Heavy Construction, Airport Construction Or Railroad Construction Work.

(B) Power Plant, Tunnels, Amusement Park, Athletic Stadium Site Work ,Pollution Control,Sewer Plant, Waste Plant, & Water Treatment Facilities, Construction.

Prevailing Wage Rate Skilled Crafts

Name of Union: Electrical Local 71 High Tension Pipe Type Cable

Change # : LCN01-2013fbLoc7

Craft : Lineman Effective Date : 01/16/2013 Last Posted : 01/16/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Electrical Lineman	\$37.30	\$5.00	\$1.12	\$0.37	\$0.00	\$7.46	\$0.15	\$0.00	\$0.00	\$51.40	\$70.05
Certified Lineman Welder	\$37.30	\$5.00	\$1.12	\$0.37	\$0.00	\$7.46	\$0.15	\$0.00	\$0.00	\$51.40	\$70.05
Certified Cable Splicer	\$37.30	\$5.00	\$1.12	\$0.37	\$0.00	\$7.46	\$0.15	\$0.00	\$0.00	\$51.40	\$70.05
Operator A	\$33.53	\$5.00	\$1.01	\$0.34	\$0.00	\$6.71	\$0.15	\$0.00	\$0.00	\$46.74	\$63.51
Operator B	\$29.77	\$5.00	\$0.89	\$0.30	\$0.00	\$5.95	\$0.15	\$0.00	\$0.00	\$42.06	\$56.95
Operator C	\$24.13	\$5.00	\$0.72	\$0.24	\$0.00	\$4.83	\$0.15	\$0.00	\$0.00	\$35.07	\$47.14
Groundman 0-12 months Exp	\$18.65	\$5.00	\$0.56	\$0.19	\$0.00	\$3.73	\$0.15	\$0.00	\$0.00	\$28.28	\$37.60
Groundman 0-12 months Exp w/CDL	\$20.51	\$5.00	\$0.62	\$0.21	\$0.00	\$4.10	\$0.15	\$0.00	\$0.00	\$30.59	\$40.85
Groundman 1 yr or more	\$20.51	\$5.00	\$0.62	\$0.21	\$0.00	\$4.10	\$0.15	\$0.00	\$0.00	\$30.59	\$40.85
Groundman 1 yr or more w/CDL	\$24.25	\$5.00	\$0.73	\$0.24	\$0.00	\$4.85	\$0.15	\$0.00	\$0.00	\$35.22	\$47.35
Equipment Mechanic A	\$29.77	\$5.00	\$0.89	\$0.30	\$0.00	\$5.95	\$0.15	\$0.00	\$0.00	\$42.06	\$56.95
Equipment	\$26.95	\$5.00	\$0.81	\$0.27	\$0.00	\$5.39	\$0.15	\$0.00	\$0.00	\$38.57	\$52.05

Mechanic B												
Equipment Mechanic C	\$24.13	\$5.00	\$0.72	\$0.24	\$0.00	\$4.83	\$0.15	\$0.00	\$0.00	\$35.07	\$47.14	
X-Ray Technician	\$37.30	\$5.00	\$1.12	\$0.37	\$0.00	\$7.46	\$0.15	\$0.00	\$0.00	\$51.40	\$70.05	
Apprentice	Percent											
1st 1000 hrs	60.00	\$22.38	\$5.00	\$0.67	\$0.22	\$0.00	\$4.48	\$0.15	\$0.00	\$0.00	\$32.90	\$44.09
2nd 1000 hrs	65.01	\$24.25	\$5.00	\$0.73	\$0.24	\$0.00	\$4.85	\$0.15	\$0.00	\$0.00	\$35.22	\$47.34
3rd 1000 hrs	70.00	\$26.11	\$5.00	\$0.78	\$0.26	\$0.00	\$5.22	\$0.15	\$0.00	\$0.00	\$37.52	\$50.57
4th 1000 hrs	75.01	\$27.98	\$5.00	\$0.84	\$0.28	\$0.00	\$5.60	\$0.15	\$0.00	\$0.00	\$39.85	\$53.84
5th 1000 hrs	80.00	\$29.84	\$5.00	\$0.90	\$0.30	\$0.00	\$5.97	\$0.15	\$0.00	\$0.00	\$42.16	\$57.08
6th 1000 hrs	85.01	\$31.71	\$5.00	\$0.95	\$0.32	\$0.00	\$6.34	\$0.15	\$0.00	\$0.00	\$44.47	\$60.32
7th 1000 hrs	90.00	\$33.57	\$5.00	\$1.01	\$0.34	\$0.00	\$6.71	\$0.15	\$0.00	\$0.00	\$46.78	\$63.57

Special Calculation Note :

Operator "A"
 John Henry Rock Drill, D-6 (or equivalent) and above, Trackhoe Digger, (320 Track excavator), Cranes (greater then 25 tons and less than 45 tons).

Operator "B"
 Cranes (greater than 6 tons and up to 25 tons), Backhoes, Road Tractor, Dozer up to D-5, Pressure Digger- wheeled or tracked, all Tension wire Stringing equipment.

Operator "C"
 Trench, Backhoe, Riding type vibratory Compactor, Ground Rod Driver, Boom Truck (6 ton & below), Skid Steer Loaders, Material Handler.

*All Operators of cranes 45 ton or larger shall be paid the journeyman rate of pay. \$0.15 is for Health Retirement Account.

Ratio :

1 Journeyman to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :
 ADAMS, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA,

COSHOCTON, CRAWFORD, CUYAHOGA,
DARKE, DELAWARE, FAIRFIELD, FAYETTE,
FRANKLIN, GALLIA, GEAUGA, GREENE,
GUERNSEY, HAMILTON, HARRISON,
HIGHLAND, HOCKING, HOLMES, JACKSON,
JEFFERSON, KNOX, LAKE, LAWRENCE,
LICKING, LOGAN, LORAIN, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, PERRY, PICKAWAY,
PIKE, PORTAGE, PREBLE, RICHLAND,
ROSS, SCIOTO, SHELBY, STARK, SUMMIT,
TRUMBULL, TUSCARAWAS, UNION,
VINTON, WARREN, WASHINGTON, WAYNE

Special Jurisdictional Note :

Details :

Heli - Arc Welding will be paid \$.30 above Journeyman rate. Additional compensation of 10% over the Journeyman Lineman and Journeyman Technician for performing work on structures outside of buildings such as water towers, smoke stacks, radio and television towers, more than 75' above the ground.

Prevailing Wage Rate Skilled Crafts

Name of Union: Electrical Local 71 Outside (North Central Ohio)

Change # : LCN01-2013fbLoc71CentralOhio

Craft : Lineman Effective Date : 01/16/2013 Last Posted : 01/16/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Electrical Lineman	\$33.50	\$5.00	\$1.01	\$0.34	\$0.00	\$5.70	\$0.00	\$0.00	\$0.00	\$45.55	\$62.30
Traffic Signal & Lighting Journeyman	\$32.25	\$5.00	\$0.97	\$0.32	\$0.00	\$5.48	\$0.00	\$0.00	\$0.00	\$44.02	\$60.14
Equipment Operator	\$30.15	\$5.00	\$0.90	\$0.30	\$0.00	\$5.13	\$0.00	\$0.00	\$0.00	\$41.48	\$56.55
Groundman 0-12 months	\$18.43	\$5.00	\$0.55	\$0.18	\$0.00	\$3.13	\$0.00	\$0.00	\$0.00	\$27.29	\$36.50
Groundman 1 year plus	\$21.78	\$5.00	\$0.65	\$0.22	\$0.00	\$3.70	\$0.00	\$0.00	\$0.00	\$31.35	\$42.24
<hr/> <hr/>											
Traffic Signal Apprentices											
1st 1,000 hours	\$19.35	\$5.00	\$0.58	\$0.19	\$0.00	\$3.29	\$0.00	\$0.00	\$0.00	\$28.41	\$38.09
2nd 1,000 hours	\$20.96	\$5.00	\$0.63	\$0.21	\$0.00	\$3.56	\$0.00	\$0.00	\$0.00	\$30.36	\$40.84
3rd 1,000 hours	\$22.58	\$5.00	\$0.68	\$0.23	\$0.00	\$3.84	\$0.00	\$0.00	\$0.00	\$32.33	\$43.62
4th 1,000 hours	\$24.19	\$5.00	\$0.73	\$0.24	\$0.00	\$4.11	\$0.00	\$0.00	\$0.00	\$34.27	\$46.37
5th 1,000 hours	\$25.80	\$5.00	\$0.77	\$0.26	\$0.00	\$4.39	\$0.00	\$0.00	\$0.00	\$36.22	\$49.12
6th 1,000 hours	\$29.03	\$5.00	\$0.87	\$0.29	\$0.00	\$4.94	\$0.00	\$0.00	\$0.00	\$40.13	\$54.64
<hr/> <hr/>											
Apprentice Lineman	Percent										

1st 1,000 Hours	60.00	\$20.10	\$5.00	\$0.60	\$0.20	\$0.00	\$3.42	\$0.00	\$0.00	\$0.00	\$29.32	\$39.37
2nd 1,000 Hours	65.00	\$21.78	\$5.00	\$0.65	\$0.22	\$0.00	\$3.70	\$0.00	\$0.00	\$0.00	\$31.34	\$42.23
3rd 1,000 Hours	70.01	\$23.45	\$5.00	\$0.70	\$0.23	\$0.00	\$3.99	\$0.00	\$0.00	\$0.00	\$33.37	\$45.10
4th 1,000 Hours	75.01	\$25.13	\$5.00	\$0.75	\$0.25	\$0.00	\$4.27	\$0.00	\$0.00	\$0.00	\$35.40	\$47.96
5th 1,000 Hours	80.00	\$26.80	\$5.00	\$0.80	\$0.27	\$0.00	\$4.56	\$0.00	\$0.00	\$0.00	\$37.43	\$50.83
6th 1,000 Hours	85.01	\$28.48	\$5.00	\$0.85	\$0.28	\$0.00	\$4.84	\$0.00	\$0.00	\$0.00	\$39.45	\$53.69
7th 1,000 Hours	90.00	\$30.15	\$5.00	\$0.90	\$0.30	\$0.00	\$5.13	\$0.00	\$0.00	\$0.00	\$41.48	\$56.56

Special Calculation Note : Other is National Electrical Benefit Fund (NEBF) and Safety & Education Fund.

Ratio :

1 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

BELMONT, CARROLL, HARRISON, HOLMES, JEFFERSON, MEDINA, PORTAGE, STARK, SUMMIT, WAYNE

Special Jurisdictional Note :

Details :

A groundman when directed shall assist a Journeyman in the performance of his/her work on the ground, including the use of hand tools. A Groundman under no circumstances shall climb poles, towers, ladders, or work from an elevated platform or bucket truck.

Scope of Work: installation and maintenance of highway and street lighting, highway and street sign lighting, electronic message boards and traffic control systems, camera systems, traffic signal work, substation and line construction including overhead and underground projects for private and industrial work as in accordance with the IBEW Constitution. This Agreement includes the operation of all tools and equipment necessary for the installation of the above projects.

Prevailing Wage Rate Skilled Crafts

Name of Union: Electrical Local 71 Outside Utility Power

Change # : LCN01-2013fbLoc7

Craft : Lineman Effective Date : 01/16/2013 Last Posted : 01/16/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Electrical Lineman	\$35.38	\$5.00	\$1.06	\$0.35	\$0.00	\$7.08	\$0.15	\$0.00	\$0.00	\$49.02	\$66.71
Substation Technician	\$35.38	\$5.00	\$1.06	\$0.35	\$0.00	\$7.08	\$0.15	\$0.00	\$0.00	\$49.02	\$66.71
Cable Splicer	\$37.02	\$5.00	\$1.11	\$0.37	\$0.00	\$7.40	\$0.15	\$0.00	\$0.00	\$51.05	\$69.56
Operator A	\$31.82	\$5.00	\$0.95	\$0.32	\$0.00	\$6.36	\$0.15	\$0.00	\$0.00	\$44.60	\$60.51
Operator B	\$28.22	\$5.00	\$0.85	\$0.28	\$0.00	\$5.64	\$0.15	\$0.00	\$0.00	\$40.14	\$54.25
Operator C	\$22.86	\$5.00	\$0.69	\$0.23	\$0.00	\$4.57	\$0.15	\$0.00	\$0.00	\$33.50	\$44.93
Groundman 0-12 months Exp	\$17.69	\$5.00	\$0.53	\$0.18	\$0.00	\$3.54	\$0.15	\$0.00	\$0.00	\$27.09	\$35.94
Groundman 0-12 months Exp w/CDL	\$19.46	\$5.00	\$0.58	\$0.19	\$0.00	\$3.89	\$0.15	\$0.00	\$0.00	\$29.27	\$39.00
Groundman 1 yr or more	\$19.46	\$5.00	\$0.58	\$0.19	\$0.00	\$3.89	\$0.15	\$0.00	\$0.00	\$29.27	\$39.00
Groundman 1 yr or more w/CDL	\$23.00	\$5.00	\$0.69	\$0.23	\$0.00	\$4.60	\$0.15	\$0.00	\$0.00	\$33.67	\$45.17
Equipment Mechanic A	\$28.23	\$5.00	\$0.85	\$0.28	\$0.00	\$5.65	\$0.15	\$0.00	\$0.00	\$40.16	\$54.28
Equipment Mechanic B	\$25.55	\$5.00	\$0.77	\$0.26	\$0.00	\$5.11	\$0.15	\$0.00	\$0.00	\$36.84	\$49.62

Equipment Mechanic C	\$22.86	\$5.00	\$0.69	\$0.23	\$0.00	\$4.57	\$0.15	\$0.00	\$0.00	\$33.50	\$44.93	
Line Truck w/uuger	\$25.18	\$5.00	\$0.76	\$0.25	\$0.00	\$5.04	\$0.15	\$0.00	\$0.00	\$36.38	\$48.97	
Apprentice	Percent											
1st 1000 hrs	60.00	\$21.23	\$5.00	\$0.63	\$0.21	\$0.00	\$4.25	\$0.15	\$0.00	\$0.00	\$31.47	\$42.08
2nd 1000 hrs	65.00	\$23.00	\$5.00	\$0.69	\$0.23	\$0.00	\$4.60	\$0.15	\$0.00	\$0.00	\$33.67	\$45.17
3rd 1000 hrs	70.00	\$24.77	\$5.00	\$0.74	\$0.25	\$0.00	\$4.95	\$0.15	\$0.00	\$0.00	\$35.86	\$48.24
4th 1000 hrs	75.00	\$26.54	\$5.00	\$0.80	\$0.27	\$0.00	\$5.31	\$0.15	\$0.00	\$0.00	\$38.07	\$51.33
5th 1000 hrs	80.00	\$28.30	\$5.00	\$0.85	\$0.28	\$0.00	\$5.66	\$0.15	\$0.00	\$0.00	\$40.24	\$54.40
6th 1000 hrs	85.00	\$30.07	\$5.00	\$0.90	\$0.30	\$0.00	\$6.01	\$0.15	\$0.00	\$0.00	\$42.43	\$57.47
7th 1000 hrs	90.00	\$31.84	\$5.00	\$0.96	\$0.32	\$0.00	\$6.37	\$0.15	\$0.00	\$0.00	\$44.64	\$60.56

Special Calculation Note :

Operator "A"

John Henry Rock Drill, D-6 (or equivalent) and above, Trackhoe Digger, (320 Track excavator), Cranes (greater then 25 tons and less than 45 tons).

Operator "B"

Cranes (greater than 6 tons and up to 25 tons), Backhoes, Road Tractor, Dozer up to D-5, Pressure Digger- wheeled or tracked, all Tension wire Stringing equipment.

Operator "C"

Trench, Backhoe, Riding type vibratory Compactor, Ground Rod Driver, Boom Truck (6 ton & below), Skid Steer Loaders, Material Handler.

Ratio :

(1) Journeyman Lineman to (1) Apprentice

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, CUYAHOGA, DARKE, DELAWARE, FAIRFIELD, FAYETTE, FRANKLIN, GALLIA, GEAUGA, GREENE, GUERNSEY, HAMILTON, HARRISON, HIGHLAND, HOCKING, HOLMES, JACKSON,

JEFFERSON, KNOX, LAKE, LAWRENCE,
LICKING, LOGAN, LORAIN, MADISON,
MAHONING, MARION, MEDINA, MEIGS,
MERCER, MIAMI, MONROE,
MONTGOMERY, MORGAN, MORROW,
MUSKINGUM, NOBLE, PERRY, PICKAWAY,
PIKE, PORTAGE, PREBLE, RICHLAND,
ROSS, SCIOTO, SHELBY, STARK, SUMMIT,
TRUMBULL, TUSCARAWAS, UNION,
VINTON, WARREN, WASHINGTON, WAYNE

Special Jurisdictional Note : 0.15 is for Health Retirement Account.

Details :

Heli - Arc Welding will be paid \$.30 above Journeyman rate. Additional compensation of 10% over the Journeyman Lineman and Journeyman Technician for performing work on structures outside of buildings such as water towers, smoke stacks, radio and television towers, more than 75' above the ground.

contribution is equal to 7.5% of the gross weekly wages.

Ratio :

1 to 3 Journeymen to 2 Apprentices
 4 to 6 Journeymen up to 4 Apprentices
 7 to 9 Journeymen up to 6 Apprentices

Jurisdiction (* denotes special jurisdictional note) :

CARROLL*, COLUMBIANA*, HOLMES,
 MAHONING*, STARK, TUSCARAWAS*,
 WAYNE*

Construction Electrician and Construction Wireman Ratio

There shall be a minimum ratio of one inside Journeyman Wireman to every (4) employees of different classifications per jobsite. An Inside Journeyman Wireman is required on the project as the fifth (5th) worker or when apprentices are used.

Special Jurisdictional Note : Carroll County: North half including; Fox, Harrison, Rose and Washington Townships.

Columbiana County: Knox Township only.

Mahoning County: Smith Township only.

Tuscarawas County: That portion North of Auburn, Clay, Rush and York Townships.

Wayne County: That portion south of Baughman, Chester, Green, Wayne and Wooster Townships.

The scope of work for the light commercial agreement shall apply to the following small medical clinics, stand-alone doctor and dentist offices with up to 600 amp service (not attached to a hospital), gas stations/convenience stores, fast food restaurants and franchised chain restaurants including independent bars and taverns, places of worship, funeral homes, nursing homes, assisted living facilities and day-care facilities under 15,000 sq ft, small office, retail/wholesale facilities under 15,000 sq ft with less than 10 units attached, storage units, car washes, express hotels and motels (4 stories or less) without conference or restaurants facilities, residential units (subject to Davis Bacon Rates) small stand-alone manufacturing facilities when free standing and not part of a larger facility (less than 15,000 sq ft) solar projects (500 panels or less) unless other wise covered under this agreement, lighting retrofits (when not associated with remodels involving branch re-circuiting) Lighting retrofits shall be defined as the changing of lamps and ballasts in existing light fixtures and shall also include the one for one replacement of existing fixtures.

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Electrical Local 540 Inside

Change # : LCN01-2013fbLoc540in

Craft : Electrical Effective Date : 01/09/2013 Last Posted : 01/09/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Electrician	\$28.35		\$5.70	\$7.71	\$0.87	\$2.13	\$2.60	\$0.91	\$0.00	\$0.00	\$48.27	\$62.45
Apprentice	Percent											
1st 1000 hrs	40.00	\$11.34	\$5.70	\$0.00	\$0.44	\$0.00	\$0.00	\$0.34	\$0.00	\$0.00	\$17.82	\$23.49
2nd 1000 hrs	45.00	\$12.76	\$5.70	\$0.00	\$0.47	\$0.00	\$0.00	\$0.38	\$0.00	\$0.00	\$19.31	\$25.69
3rd 1500 hrs	50.00	\$14.18	\$5.70	\$1.54	\$0.51	\$0.43	\$0.52	\$0.44	\$0.00	\$0.00	\$23.32	\$30.40
4th 1500 hrs	60.00	\$17.01	\$5.70	\$3.08	\$0.57	\$0.51	\$1.04	\$0.53	\$0.00	\$0.00	\$28.44	\$36.95
5th 1500 hrs	70.01	\$19.85	\$5.70	\$4.63	\$0.64	\$0.60	\$1.56	\$0.61	\$0.00	\$0.00	\$33.59	\$43.51
6th 1500 hrs	80.00	\$22.68	\$5.70	\$6.17	\$0.71	\$0.68	\$2.08	\$0.70	\$0.00	\$0.00	\$38.72	\$50.06

Special Calculation Note : OTHER = (NEBF) National Electrical Benefit Fund. Vacation contribution is equal to 7.5% of the gross weekly wages.

Ratio :

The first person assigned to any job site shall be a Journeyman Wireman. Ratio thereafter:

Jurisdiction (* denotes special jurisdictional note) :

CARROLL*, COLUMBIANA*, HOLMES, MAHONING*, STARK, TUSCARAWAS*, WAYNE*

1-3 Journeymen to 2 Apprentices
4 to 6 Journeymen up to 4 Apprentices
7 to 9 Journeymen up to 6 Apprentices

Special Jurisdictional Note : Carroll County: North half including; Fox, Harrison, Rose and Washington Townships.

Columbiana County: Knox Township only.

Mahoning County: Smith Township only.

Tuscarawas County: That portion North of Auburn, Clay, Rush and York Townships.

Wayne County: That portion south of Baughman, Chester, Green, Wayne and Wooster Townships.

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Electrical Local 540 Voice Data Video

Change # : LCN01-2013fbLoc540VDV

Craft : Voice Data Video Effective Date : 01/09/2013 Last Posted : 01/09/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Electrical Installer Technician	\$19.15		\$5.70	\$3.49	\$0.46	\$1.26	\$0.81	\$0.61	\$0.00	\$0.00	\$31.48	\$41.06
Cable Puller	\$9.58		\$5.70	\$3.49	\$0.23	\$0.63	\$0.71	\$0.31	\$0.00	\$0.00	\$20.65	\$25.44
Apprentice	Percent											
1st period	55.00	\$10.53	\$5.70	\$0.00	\$0.25	\$0.69	\$0.00	\$0.34	\$0.00	\$0.00	\$17.51	\$22.78
2nd period	65.00	\$12.45	\$5.70	\$0.00	\$0.30	\$0.82	\$0.00	\$0.40	\$0.00	\$0.00	\$19.67	\$25.89
3rd period	75.00	\$14.36	\$5.70	\$3.49	\$0.34	\$0.95	\$0.71	\$0.46	\$0.00	\$0.00	\$26.01	\$33.19
4th period	80.00	\$15.32	\$5.70	\$3.49	\$0.37	\$1.01	\$0.71	\$0.49	\$0.00	\$0.00	\$27.09	\$34.75
5th period	85.02	\$16.28	\$5.70	\$3.49	\$0.39	\$1.07	\$0.71	\$0.52	\$0.00	\$0.00	\$28.16	\$36.30
6th period	90.03	\$17.24	\$5.70	\$3.49	\$0.41	\$1.14	\$0.71	\$0.55	\$0.00	\$0.00	\$29.24	\$37.86

Special Calculation Note : OTHER = (NEBF) National Electrical Benefit Fund.

VACATION PAY - Based on time worked within the industry. The employer agrees to contribute a sum equal to an additional 4.3% of the hourly rate during the first year of employment. After an employee works for a period of one year such employee shall be paid 6.4% of the hourly rate. After two or more years the employee shall be paid 6.6% of hourly rate.

Ratio : **Jurisdiction (* denotes special jurisdictional note) :**

1-2 Journeyman to 0 Apprentice
3-4 Journeyman to 1 Apprentice
5-7 Journeyman to 2 Apprentice

CARROLL*, COLUMBIANA*, HOLMES,
MAHONING*, STARK, TUSCARAWAS*,
WAYNE*

** Exception - When fire alarm falls within the scope of this addendum, Cable Pullers can be used to aid in test and be the 2nd Teledata employee on the job

Special Jurisdictional Note : Carroll County includes the following townships: North half including Fox, Harrison, Rose and Washington. Tuscarawas County includes the following townships: The portion North of Auburn, Clay, Rush and York. Wayne County includes the following townships: The portion South of Baughman, Chester, Green, and Wayne. Columbiana County includes Knox township. Mahoning County includes Smith township.

Details :

CABLE PULLERS - are for the installation of cable from one termination point to another.

The following work is EXCLUDED from the Teledata Technician work scope:

- * - Installation of computer systems in industrial applications such as assembly lines, robotics, computer controller manufacturing systems.
- * - Installation of conduit and/ or raceways shall be installed by Inside Wireman . On sites where there is no Inside Wireman employed, the Teledata Technician may install raceway, or conduit not greater than 10 feet.
- * - Fire Alarm work on all new construction sites or wherever the fire alarm system is installed in conduit.
- * - All HVAC control work.

Prevailing Wage Rate Skilled Crafts

Name of Union: Elevator Local 45

Change # : LCN01-2012kpLoc45

Craft : Elevator Effective Date : 04/04/2012 Last Posted : 04/04/2012

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Elevator Mechanic	\$41.92	\$11.03	\$6.96	\$0.55	\$3.35	\$5.00	\$0.00	\$0.00	\$0.00	\$68.81	\$89.77
Helper	\$29.34	\$11.03	\$6.96	\$0.55	\$1.76	\$5.00	\$0.00	\$0.00	\$0.00	\$54.64	\$69.31
0-6 months Probation	50.00	\$20.96	\$11.03	\$6.96	\$0.55	\$1.26	\$5.00	\$0.00	\$0.00	\$45.76	\$56.24
1st year	55.00	\$23.06	\$11.03	\$6.96	\$0.55	\$1.38	\$5.00	\$0.00	\$0.00	\$47.98	\$59.50
2nd year	65.00	\$27.25	\$11.03	\$6.96	\$0.55	\$1.64	\$5.00	\$0.00	\$0.00	\$52.43	\$66.05
3rd year	70.00	\$29.34	\$11.03	\$6.96	\$0.55	\$1.76	\$5.00	\$0.00	\$0.00	\$54.64	\$69.32
4th year	80.00	\$33.54	\$11.03	\$6.96	\$0.55	\$2.01	\$5.00	\$0.00	\$0.00	\$59.09	\$75.85

Special Calculation Note : Vacation moves to 8% of BHR after 5 years

Ratio :

The total number of Helpers & Apprentices employed shall not exceed the number of Mechanics on any one job, except on jobs where (2) teams or more are working, (1) extra Helper or Apprentice may be employed for the first (2) teams and an extra Helper or Apprentice for each additional (3) teams.

Jurisdiction (* denotes special jurisdictional note) :

ASHLAND, CARROLL, COLUMBIANA, COSHOCTON, HARRISON, HOLMES, MAHONING, MEDINA, PORTAGE, RICHLAND, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Vacation 6%/under 5 years based on regular hourly rate for all hours worked. 8%/over 5 years based on regular hourly rate for all hours worked.

Prevailing Wage Rate Skilled Crafts

Name of Union: **Glazier Local 1162**

Change # : LCN01-2013jcLoc1162

Craft : Glazier Effective Date : 05/08/2013 Last Posted : 05/08/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Glazier	\$23.16		\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$35.09	\$46.67
Apprentice	Percent											
1st 6 months	50.00	\$11.58	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$23.51	\$29.30
2nd 6 months	55.00	\$12.74	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$24.67	\$31.04
3rd 6 months	60.00	\$13.90	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$25.83	\$32.77
4th 6 months	65.00	\$15.05	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$26.98	\$34.51
5th 6 months	70.00	\$16.21	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$28.14	\$36.25
6th 6 months	75.00	\$17.37	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$29.30	\$37.99
7th 6 months	80.00	\$18.53	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$30.46	\$39.72
8th 6 months	90.00	\$20.84	\$6.48	\$4.95	\$0.25	\$0.00	\$0.00	\$0.25	\$0.00	\$0.00	\$32.77	\$43.20

Special Calculation Note : OTHER IS : Supplemental Unemployment Benefits

Ratio :

1 Journeyman to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COSHOCTON, HOLMES,

3 Journeymen to 1 Apprentice Thereafter

MEDINA, PORTAGE, STARK, SUMMIT,
TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Add \$1.25 per hour for High Pay which is all work that requires the employee be supported by equipment which hangs or suspends from the roof of a building or structure including all repelling .

1 Apprentice to 1 Journeymen

note) :

ASHLAND, CARROLL, COLUMBIANA*,
COSHOCTON, HOLMES, HURON*,
MAHONING*, MEDINA*, PORTAGE*,
RICHLAND, STARK, SUMMIT*, TUSCARAWAS,
WAYNE

Special Jurisdictional Note : The jurisdictional line between Locals 17 and 550 is determined as follows: All territory North of Old Route 224 line is to be within the jurisdiction of Local 17. All territory South of Old Route 224 line is to be the jurisdiction of Local 550, except for everything within the City limits of Barberton which shall be under the jurisdiction of Local 17.

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Ironworker Local 550

Change # : LCN01-2013fbLoc550

Craft : Ironworker Effective Date : 06/19/2013 Last Posted : 06/19/2013

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Ironworker	\$25.32	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$42.89	\$55.55	
Apprentice	Percent											
1st 6 months	60.00	\$15.19	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$32.76	\$40.36
2nd 6 months	65.00	\$16.46	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$34.03	\$42.26
3rd 6 months	70.00	\$17.72	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$35.29	\$44.16
4th 6 months	75.00	\$18.99	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$36.56	\$46.06
5th 6 months	80.00	\$20.26	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$37.83	\$47.95
6th 6 months	85.00	\$21.52	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$39.09	\$49.85
7th 6 months	90.00	\$22.79	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$40.36	\$51.75
8th 6 months	95.00	\$24.05	\$5.43	\$8.17	\$0.64	\$0.00	\$2.48	\$0.85	\$0.00	\$0.00	\$41.62	\$53.65

Special Calculation Note : OTHER IS: JOURNEYMAN UPGRADE AND WELLNESS FUND.

Ratio :

Jurisdiction (* denotes special jurisdictional note) :

4 Journeymen to 1 Apprentice
1 Journeymen to 1 Apprentice, spinning of cable
for suspension bridge

1 Journeymen to 1 Apprentice, ornamental work

2 Journeymen to 1 Apprentice, reinforcing work

***the ratio of apprentices to journeymen may be
adjusted higher on a job-to job basis with the
approval of the business manager and/or business
agent.

ASHLAND, CARROLL, COLUMBIANA*,
COSHOCTON, HOLMES*, HURON,
MAHONING*, MEDINA*, PORTAGE*,
RICHLAND, STARK, SUMMIT*,
TUSCARAWAS, WAYNE

Special Jurisdictional Note : The jurisdictional line between Local 17 and Local 550 is determined as follows: All territory North of Old Route 224 line to be within the jurisdiction of Local 17. All territory South of Old Route 224 line is to be the jurisdiction of Local 550, except for everything within the City limits of Barberton which shall be under the jurisdiction of Local 17.

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Labor Hwy2

Change # : LCN01-2013jcLaborHwy2

Craft : Laborer Group 1 Effective Date : 05/08/2013 Last Posted : 05/08/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Laborer Group 1	\$27.15		\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$37.00	\$50.57
Group 2	\$27.32		\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$37.17	\$50.83
Group 3	\$27.65		\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$37.50	\$51.32
Group 4	\$28.10		\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$37.95	\$52.00
Watch Person	\$19.45		\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$29.30	\$39.03
Apprentice	Percent											
0-1000 hrs	60.00	\$16.29	\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$26.14	\$34.29
1001-2000 hrs	70.00	\$19.00	\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$28.86	\$38.36
2001-3000 hrs	80.00	\$21.72	\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$31.57	\$42.43
3001-4000 hrs	90.00	\$24.43	\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$34.29	\$46.50
More Than 4000 hrs	100.00	\$27.15	\$6.40	\$3.00	\$0.35	\$0.00	\$0.00	\$0.00	\$0.10	\$0.00	\$37.00	\$50.57

Special Calculation Note : Watchman has no Apprentices

Ratio :

1 Journeymen to 1 Apprentice
4 Journeymen to 1 Apprentice thereafter

Jurisdiction (* denotes special jurisdictional note) :

ASHTABULA, ERIE, HURON, LORAIN,
LUCAS, MAHONING, MEDINA, OTTAWA,

PORTAGE, SANDUSKY, STARK, SUMMIT,
TRUMBULL, WOOD

Special Jurisdictional Note : Hod Carriers and Common Laborers - Heavy, Highway, Sewer, Waterworks, Utility, Airport, Railroad, Industrial and Building Site, Sewer Plant, Waste Water Treatment Facilities Construction

Details :

Group 1

Laborer (Construction); Plant Laborer or Yardman, Right-of-way Laborer, Landscape Laborer, Highway Lighting Worker, Signalization Worker, (Swimming) Pool Construction Laborer, Utility Man, Bridge Man, Handyman, Joint Setter, Flagperson, Carpenter Helper, Waterproofing Laborer, Slurry Seal, Seal Coating, Surface Treatment or Road Mix Laborer, Riprap Laborer & Grouter, Asphalt Laborer, Dump Man (batch trucks), Guardrail & Fence Installer, Mesh Handler & Placer, Concrete Curing Applicator, Scaffold Erector, Sign Installer, Hazardous Waste (level D), Diver Helper, Zone Person and Traffic Control.

Group 2

Asphalt Raker, Screwman or Paver, Concrete Puddler, Kettle Man (pipeline), All Machine-Driven Tools (Gas, Electric, Air), Mason Tender, Brick Paver, Mortar Mixer, Skid Steer, Sheeting & Shoring Person, Surface Grinder Person, Screedperson, Water Blast, Hand Held Wand, Power Buggy or Power Wheelbarrow, Paint Striper, Plastic fusing Machine Operator, Rodding Machine Operator, Pug Mill Operator, Operator of All Vacuum Devices Wet or Dry, Handling of all Pumps 4 inches and under (gas, air or electric), Bottom Person, Welder Helper (pipeline), Concrete Saw Person, Cutting with Burning Torch, Pipe Layer, Hand Spiker (railroad), Underground Person (working in sewer and waterline, cleaning, repairing and reconditioning). Tunnel Laborer (without air), Caisson, Cofferdam (below 25 feet deep), Air Track and Wagon Drill, Sandblaster Nozzle Person, Hazardous Waste (level B), Lead Abatement, Hazardous Waste (level C)

Group 3

Blast and Powder Person, Muckers (with miners), Wrencher (mechanical joints & utility pipeline), Yarnier, Top Lander, Hazardous Waste (level A), Concrete Specialist, Curb Setter and Cutter, Concrete Crew in Tunnels. Utility pipeline Tappers, Waterline, Caulker, Signal Person, Grade Checker

Group 4

Miner, Welder, Gunitite Nozzle Person

Special Jurisdictional Note :**Details :**

Group 1

Building & Construction Laborer, Signalman, Flagman, Tool Cribman, Carpenter Tender, Finisher Tender, Concrete Handler, Utility Construction Laborer, Guard Rail Erectors, Hazardous Waste (Level D)

Group 2

Bottom Man, Scaffold Builder, Tunnel laborer, Pipe Layer, Air and Power Driven Tools, Burner on Demolition Work, Swinging Scaffold, Mucker, Caisson Worker, Cofferdam Worker, Powder Men and Dynamite Blaster, Creosote Worker, Form Setter, Plasterer Tender, Hod Carrier Laser Beam Set-up Man, All confined space work, furnaces, pickel tubs, acid-pits, and Hazardous Waste Level (C)

Group 3

Mason Tender, Mortar Mixer, Stonemason Tender, skid-loader, Hazardous Waste Level (B)

Group 4

Gunnite Operator, Hazardous Waste Level (A)

Group 5

Watchman

For every (3) Operating Engineer Journeymen employed by the company, there may be employed (1) Registered Apprentice. An apprentice, while employed as part of a crew per Article VIII, paragraph 77, will not be subject to the apprenticeship ratios in this collective bargaining agreement. On jobs where maintenance engineers are to be employed, for every (2) Class 2 Mechanics there may be (1) Mechanic Trainee & so fourth.

note) :

ADAMS, ALLEN, ASHLAND, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COSHOCTON, CRAWFORD, DARKE, DEFIANCE, DELAWARE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, JACKSON, JEFFERSON, KNOX, LAWRENCE, LICKING, LOGAN, MADISON, MARION, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WYANDOT

Special Jurisdictional Note :

Details :

**Apprentices will receive a 10% increase on top of the percentages listed above provided they are operating mobile equipment. Mechanic Trainees will receive 10% increase if required to have CDL

Class 1 - Barrier Moving Machine; Boiler Operators or Compressor Operators, when compressor or boiler is mounted on crane (Piggyback Operation); Boom Trucks (all types); Cableways Cherry Pickers; Combination - Concrete Mixers & Towers; All Concrete Pumps with Booms; Cranes (all types) Derricks (all types); Draglines Dredges (dipper, clam or suction) 3-man crew; Elevating Graders or Euclid Loaders; Floating Equipment; Gradalls; Helicopter Operators; hoisting building materials; Helicopter Winch Operators, Hoisting building materials; Hoes (All types); Hoists (with two or more drums in use); Hydraulic Gantry (lift system); Laser Finishing Machines; Lift Slab or Panel Jack Operators; Locomotives (all types); Maintenance Engineers (Mechanic and/or Welder); Mixers, paving (multiple drum); Mobile Concrete Pumps, with booms, Panelboards, (all types on site); Pile Drivers; Power Shovels; Prentice Loader; Rail Tamper (with automatic lifting and aligning device); Rotary Drills (all) used on caissons for foundations and sub-structure work; Side Booms; Slip Form Pavers; Straddle Carriers (Building Construction on site); Tug Boats. Horizontal Directional Drill, Rough Terrain Fork-lift with Winch/Hoist, Laser Screed, and Like equipment; Compact Cranes, track or rubber over 4,000 pound capacity, self-erecting cranes: stationary, track or truck (all configurations) bucket trench machines (over 24" wide).

Class 2 - Asphalt Pavers; Bobcat-type and/or skid steer loader with hoe attachment greater than 7000 lbs. Bulldozers; CMI type Equipment; Endloaders; Hydro Milling Machine; Kolman-type Loaders (Dirt Loading); Lead Greasemen; Mucking Machines; Pettibone-Rail Equipment; Power Graders; Power Scoops; Power

Scrapers; Push Cats; Vermeer Type Concrete Saw; All rotomills, grinders & planers of all types. Articulating/end dumps (minus \$4.00/hour from Class 2 rate)

Class 3 - A Frames; Air Compressors, Pressurizing Shafts or Tunnels; All Asphalt Rollers; Bobcat-type and/or skid steer loader with or without attachments; Boilers (15 lbs pressure and over); All concrete Pumps (without booms with 5 inch system); Fork Lifts (except masonry); Highway Drillers - all types (with integral power); Hoists (with one drum); House Elevators (except those automatic call button controlled); Man lifts; Mud Jacks; Pressure Grouting; Pump Operators (installing or operating Well Points or other types of Dewatering Systems); Pumps (4 inches and over discharge); Railroad Tie Inserter/Remover; Rotator (Lime-Soil Stabilizer); Submersible Pumps (4 inches and over discharge); Switch & Tie Tampers (without lifting and aligning device); Trench Machines (24 inches and under); Utility Operators; Material hoist/elevators.

Class 4 - Ballast Re-locator; Backfillers and Tampers; Batch Plant Operators; Bar and Joint Installing Machines; Bull Floats; Burlap and Curing Machines; Clefplanes; Compressors, on building construction; Concrete Spreader; Conveyors, used for handling building materials; Concrete Mixers, one bag capacity (side loader); Concrete Mixers, capacity more than one bag; Crushers; Deck Hands; Drum Fireman (in Asphalt Plant); Farm type tractors pulling attachments; Finishing Machines; Form Trenchers; Generators; Guniting Machines; Hydro-Seeders; Pavement Breakers (hydraulic or cable); Post Drivers; Post Hole Diggers; Pressure Pumps (over 1/2 inch discharge); Road Widening Trenchers; Rollers (except asphalt); All Concrete pumps (without Boom with 4 inch or smaller systems); Self-Propelled Power Spreaders; Concrete Spreaders; Self-Propelled Sub-graders; Shotcrete Machines; Tire Repairmen; Tractors, pulling sheepfoot rollers or graders; VAC/ALLS; Vibratory Compactors, with integral power; Welder Operators.

Class 5 - Boilers (less than 15 lbs. pressure); Inboard/outboard Motor Boat Launches; Light Plant Operators; Masonry Fork Lifts; Oilers/Helpers; Power Driven Heaters (oil fired); Power Scrubbers; Power Sweepers; Pumps (under 4 inch discharge); Signalmen, Submersible Pumps (under 4 inch discharge). Directional Drill Locator and Allen Screed Concrete Paver. Fueling and greasing (plus \$3.00), compact cranes; track or rubber under 4,000 pounds.

Class 6 - Master Mechanic

Class 7 - Boom & Jib 150 - 180 feet

Class 8 - Boom & Jib 180 - 249 feet

Class 9 - Boom & Jib 250 - or over

Prevailing Wage Rate Skilled Crafts

Name of Union: Operating Engineers - HevHwy II

Change # : LCN01-2013fbLoc18hevhwyl

Craft : Operating Engineer Effective Date : 08/07/2013 Last Posted : 08/07/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Operator Class 1	\$31.54		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$45.09	\$60.86
Class 2	\$31.42		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$44.97	\$60.68
Class 3	\$30.38		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$43.93	\$59.12
Class 4	\$29.20		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$42.75	\$57.35
Class 5	\$23.74		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$37.29	\$49.16
Class 6	\$31.79		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$45.34	\$61.24
Class 7	\$31.79		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$45.34	\$61.24
Class 8	\$32.04		\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$45.59	\$61.61
Great Lakes Floating Agreement												
Class 1	\$38.70		\$6.66	\$5.75	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$51.75	\$71.10
Class 2A	\$37.20		\$6.66	\$5.75	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$50.25	\$68.85
Class 2B	\$37.20		\$6.66	\$5.75	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$50.25	\$68.85
Class 3	\$33.10		\$6.66	\$5.75	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$46.15	\$62.70
Class 4	\$27.55		\$6.66	\$5.75	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$40.60	\$54.38
Apprentice	Percent											
1st Year	50.00	\$15.77	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$29.32	\$37.21
2nd Year	60.00	\$18.92	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$32.47	\$41.94
3rd Year	70.00	\$22.08	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$35.63	\$46.67
4th Year	80.00	\$25.23	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$38.78	\$51.40
Field Mech Trainee Class 2												
1st year	49.80	\$15.71	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$29.26	\$37.11

2nd year	59.75	\$18.85	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$32.40	\$41.82
3rd year	69.73	\$21.99	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$35.54	\$46.54
4th year	79.70	\$25.14	\$6.91	\$6.00	\$0.60	\$0.00	\$0.00	\$0.04	\$0.00	\$0.00	\$38.69	\$51.26

Special Calculation Note : Other: Education & Safety Fund is \$0.04 per hour.

Ratio :

For every (3) Operating Engineer Journeymen employed by the company , there may be employed (1) Registered Apprentice. An apprentice, while employed as part of a crew per Article VIII paragraph 65, will not be subject the apprenticeship ratios in this collective bargaining agreement. On jobs where maintenance engineers are to be employed, for every (2) Class 2 Mechanics there may be (1) Mechanic Trainee & so fourth. Mechanic Trainee rate is a percentage of Class 2 rate.

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ALLEN, ASHLAND, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COSHOCTON, CRAWFORD, DARKE, DEFIANCE, DELAWARE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, HURON, JACKSON, JEFFERSON, KNOX, LAWRENCE, LICKING, LOGAN, LUCAS, MADISON, MARION, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note :

Details :

**Apprentices will receive a 10% increase on top of the percentages listed above provided they are operating mobile equipment. Mechanic Trainees will receive 10% increase if they are required to have CDL.

Class 1 - Air Compressors on Steel Erection; Barrier Moving Machine; Boiler Operators, on Compressors or Generators, when mounted on a rig; Cableways, Combination Concrete mixers & Towers; Concrete Pumps; Concrete Plants (over 4 yd capacity); Cranes (all types, including Boom Trucks, Cherry Pickers); Derricks; Draglines, Dredgers (dipper, clam or suction); Elevating Graders or Euclid Loaders; Floating Equipment (all types); Gradalls, Helicopter Crew (Operator- hoist or winch); Hoes (all types); Hoisting Engines, on shaft or tunnel work; Hydraulic Gantry (lifting system); Industrial - Type Tractors; Jet Engine Dryers (D8 or D9), Diesel Tractors; Locomotives (standard gage); Maintenance Operators (class A); Mixers, paving (single or double drum); Mucking Machines; Multiple Scrapers; Piledriving Machines (all types); Power Shovels, Prentice Loader; Quad 9 (double pusher); Rail Tamper (with automatic lifting and aligning device); Refrigerating Machines (freezer operation); Side Booms; Slip Form Pavers; Tower Dericks; Tree Shredders; Truck Mounted Concrete Pumps; Tug Boats; Tunnel Machines and /or Mining Machines; Wheel Excavators. Rough Terrain Fork-lift with Winch/Hoist; Compact Cranes, track rubber over 4,000 pound capacity, self-erecting cranes; stationary, track

or truck (all configurations) Bucket trench machines (over 24 inches wide).

Class 2 - Asphalt Pavers; Automatic Subgrade Machines, self-propelled (CMI-type); Bobcat-type and /or skid steer loader with hoe attachment greater than 7000 lbs.; Boring Machine Operators (more than 48 inches); Bulldozers; Endloaders; Hydro Milling Machine; Kolman-type Loaders (production type-dirt); Lead Greasemen; Maintenance Operators, Class B (Portage and Summit Counties only); Pettibone-Rail Equipment; Power Graders; Power Scrapers; Push Cats; Lighting and Traffic Signal Installation Equipment includes all groups or classifications; Trench Machines (24inch wide and under); Vermeer Type Concrete saw. Material Transfer Equipment (Shuttle buggy) Asphalt; All rotomills,grinders and planers of all types. Horizontal Directional Drill (Over 50,000 ft.lbs.thrust and over)

Class 3 - A-Frames; Air Compressors, on tunnel work (low Pressure); Asphalt Plant Engineers; Bobcat-type and/or skid steer loader with or without attachments; Power Boilers (15 lbs pressure and over); Highway Drills (all types); Rollers, asphalt; Pump Operators (installing or operating well Points); Pumps (4 inch and over discharge); Railroad Tie Inserter/Remover; Rotator (lime-soil Stabilizer), Switch & Tie Tampers (without lifting and aligning device); Locomotives (narrow gage); Mixers, concrete (more than one bag capacity); Mixers, one bag capacity (side loader); Utilities Operators, (small equipment); Welding Machines; Material hoist/elevators. Articulating/straight bed end dumps if assigned (minus \$4.00 per hour).

Class 4 -Ballast Re-locator; Backfillers, Batch Plants; Bar and Joint Installing Machines; Boring Machine Operators (48 inch or less); Bull Floats; Burlap and Curing Machines; Concrete Plants (capacity 4 yd and under); Conveyors (highway); Concrete Saws (multiple); Crushers; Deckhands; Farm type tractors, with attachments (highway), except masonry; Finishing Machines; Firemen, Floating Equipment (all types); Fork Lifts (highway); Form Trenchers; Hydro Hammers; Hydro Seeders; Pavement Breakers; Plant Mixers; Post Drivers; Post Hole Diggers (power auger); Power Brush Burners; Power Form Handling Equipment; Road Widening Trenchers; Rollers (brick, grade, macadam); Self-Propelled Power Spreaders; Self-Propelled Sub-Graders; Tractors, pulling sheepsfoot rollers or graders; Steam Firemen; Vibratory Compactors, with integral power.

Class 5 - Compressors (portable, Sewer, Heavy and Highway); Generators; Inboard-Outboard Motor Boat Launches; Masonry Fork Lifts; Oilers/Helpers; Power Driven Heaters; Power Scrubbers; Power Sweepers; Pumps (under 4 inch discharge); Signalmen; Drum Fireman (in Asphalt Plant); Oil Heaters (Asphalt Plant); Tire Repairmen; VAC/ALLS; Fueling and greasing (plus \$3.00), compact cranes: track or rubber under 4,000 pounds.

Class 6 - Master Mechanic

Class 7 - Crane Boom 150 ft - 180 ft

Class 8 - Crane Boom over 180 ft .

GREAT LAKES FLOATING AGREEMENT:

Class 1 - Diver, Wet Tender, Engineer, (Hyd.Dredge), Craft Foreman (Master Mechanic)

Class 2A - Crane Backhoe Operator, Mechanic/Welder, Assistant Engineer (Hyd. Dredge), Leverman (Hyd Dredge) Diver Tender, Tug Operator (Tug 70T and over)

Class 2B - Friction Crane, Lattice Boom or any Crane Certification.

Class 3 - Deck Equipment Operator, (Machineryman), Maint. of Crane, Tug/Launch Operator, Loader/Dozer on Barge, Deck Machinery, Maintenance of Crane (over 50T capacity), or Backhoe (115,000lbs or more) Loaders/Dozer and like equipment on Barge, Breakwater Wall, Slip/Dock Scow.

Class4 - Deck Equipment Operator, (Machineryman/Fireman)(4 equipment Units or more), Deck Hand, Tug Engineer, Crane Maintenance, 50T and under/Backhoe 115,000lbs or less, Assistant Tug Operator, add off Road Truck.

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 603 Industrial

Change # : LCN01-2012fbLoc603Ind.

Craft : Painter Effective Date : 06/12/2012 Last Posted : 06/06/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Painter Brush Roll	\$20.00		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.00	\$41.00
Tanks & Spray Painter	\$20.53		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.53	\$41.80
Bridges, Towers, Poles, Stacks	\$20.71		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.71	\$42.07
Sandblasting, Metallizing & Structural Steel	\$20.71		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.71	\$42.07
Apprentice	Percent											
1st 6 months	45.00	\$9.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$20.00	\$24.50
2nd 6 months	50.00	\$10.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$21.00	\$26.00
3rd 6 months	55.00	\$11.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$22.00	\$27.50
4th 6 months	60.00	\$12.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$23.00	\$29.00
5th 6 months	65.00	\$13.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$24.00	\$30.50
6th 6 months	70.00	\$14.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$25.00	\$32.00
7th 6 months	75.00	\$15.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$26.00	\$33.50
8th 6 months	80.00	\$16.00	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$27.00	\$35.00

Special Calculation Note : Apprentice pay based on percentage of above appropriate classification.

Ratio :

1 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COSHOCTON, HOLMES, STARK,
TUSCARAWAS, WAYNE

Special Jurisdictional Note :**Details :**

Journeymen and apprentices using coal tar, vinyl's, epoxies or any product using hot or special thinner, shall be paid an additional \$0.50 per hour for (class 3) and an additional \$.50 for (class 4) of each classification. This does not apply to water based epoxies.

When concrete block is filled by spray application, Roller men shall be paid \$0.25 per hour in addition to the Brush and Roll rate.

Drywall Finisher: both wipe down man and finisher (\$20.95) when using Journeyman's own stilts or automatic tools (\$21.45). Drywall Finisher w/Machines both wipe down man and finisher (\$21.30) when using Journeyman's own stilts or automatic tools (\$21.80) Apprentice pay based on percentage of above appropriate classification.

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 603

Change # : LCN01-2012fbLoc603Com.

Craft : Painter Effective Date : 06/12/2012 Last Posted : 06/06/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Painter Brush Roll	\$19.70		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$30.70	\$40.55
Wallcovering Installer	\$19.80		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$30.80	\$40.70
Spray Gun Operator	\$20.20		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.20	\$41.30
Apprentice	Percent											
1st 6 months	45.00	\$8.87	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$19.87	\$24.30
2nd 6 months	50.00	\$9.85	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$20.85	\$25.77
3rd 6 months	55.00	\$10.84	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$21.83	\$27.25
4th 6 months	60.00	\$11.82	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$22.82	\$28.73
5th 6 months	65.00	\$12.81	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$23.80	\$30.21
6th 6 months	70.00	\$13.79	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$24.79	\$31.69
7th 6 months	75.00	\$14.77	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$25.77	\$33.16
8th 6 months	80.00	\$15.76	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$26.76	\$34.64

Special Calculation Note : Apprentice pay based on percentage of above appropriate classification.

Ratio :
1 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :
CARROLL, COSHOCTON, HOLMES, STARK, TUSCARAWAS, WAYNE

Special Jurisdictional Note :**Details :**

Journeyman and apprentices using coal tar, vinyl's, epoxies or any product using hot or special thinner, shall be paid an additional \$0.50 per hour for (class 3) and an additional \$.50 for (class 4) of each classification. This does not apply to water based epoxies.

When concrete block is filled by spray application, Roller men shall be paid \$0.25 per hour in addition to the Brush and Roll rate.

Drywall Finisher: both wipe down man and finisher (\$20.95) when using Journeyman's own stilts or automatic tools (\$21.45). Drywall Finisher w/Machines both wipe down man and finisher (\$21.30) when using Journeyman's own stilts or automatic tools (\$21.80) Apprentice pay based on percentage of above appropriate classification.

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 603

Change # : LCN01-2012fbLoc603Com.

Craft : Drywall Finisher Effective Date : 06/06/2012 Last Posted : 06/06/2012

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Painter Drywall Finisher	\$20.10		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.10	\$41.15
Drywall Taping	\$20.10		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.10	\$41.15
Taping and Finishing with Automatic Tools	\$20.45		\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$31.45	\$41.67
Apprentice	Percent											
1st 6 months	40.00	\$8.04	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$19.04	\$23.06
2nd 6 months	50.00	\$10.05	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$21.05	\$26.08
3rd 6 months	60.00	\$12.06	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$23.06	\$29.09
4rd 6 months	70.00	\$14.07	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$25.07	\$32.11
5th 6 months	80.00	\$16.08	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$27.08	\$35.12
6th 6 months	90.00	\$18.09	\$4.96	\$5.40	\$0.19	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$29.09	\$38.14

Special Calculation Note : Apprentice pay based on percentage of above appropriate

classification.

Ratio :

1 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COSHOCTON, HOLMES, STARK,
TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Journeymen and apprentices using coal tar, vinyl's, epoxies or any product using hot or special thinner, shall be paid an additional \$0.50 per hour for (class 3) and an additional \$.50 for (class 4) of each classification. This does not apply to water based epoxies.

When concrete block is filled by spray application, Roller men shall be paid \$0.25 per hour in addition to the Brush and Roll rate.

Drywall Finisher: both wipe down man and finisher, when using Journeyman's own stilts or automatic tools add .80 per hour worked to the classification above. Drywall Finishers: both wipe down man and taper/finisher, swing stage, ladder jack, or window jack add \$.30 per hour worked to the above classification.

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 639 (A) Sign

Change # : CN01-2009Loc639A

Craft : Painter Effective Date : 03/06/2009 Last Posted : 03/06/2009

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Painter Sign Erector	\$19.98		\$4.46	\$1.00	\$0.25	\$1.68	\$0.00	\$0.00			\$27.37	\$37.36
Serviceman	\$19.98		\$4.46	\$1.00	\$0.25	\$1.68	\$0.00	\$0.00			\$27.37	\$37.36
Metal Sign Fabricator	\$19.98		\$4.46	\$1.00	\$0.25	\$1.68	\$0.00	\$0.00			\$27.37	\$37.36
Neon Bender Pattern Maker	\$19.98		\$4.46	\$1.00	\$0.25	\$1.68	\$0.00	\$0.00			\$27.37	\$37.36
Computer Operator	\$18.98		\$4.46	\$1.00	\$0.25	\$1.61	\$0.00	\$0.00			\$26.30	\$35.79
Router	\$18.98		\$4.46	\$1.00	\$0.25	\$1.61	\$0.00	\$0.00			\$26.30	\$35.79
Plastic Wood Fabricator	\$18.98		\$4.46	\$1.00	\$0.25	\$1.61	\$0.00	\$0.00			\$26.30	\$35.79
Vinyl Applicator	\$18.98		\$4.46	\$1.00	\$0.25	\$1.61	\$0.00	\$0.00			\$26.30	\$35.79
Apprentice For Sign Service, Metal, Neon, Pattern	Percent											
1000 hrs	50.00	\$9.99	\$4.46	\$1.00	\$0.25	\$1.03	\$0.00	\$0.00			\$16.73	\$21.73
2000 hrs	55.00	\$10.99	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$17.07	\$22.56
3000 hrs	60.00	\$11.99	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$18.07	\$24.06
4000 hrs	65.00	\$12.99	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$19.07	\$25.56
5000 hrs	70.00	\$13.99	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$20.07	\$27.06
6000 hrs	85.00	\$16.98	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$23.06	\$31.55
7000 hrs	90.00	\$17.98	\$4.46	\$1.00	\$0.25	\$0.37	\$0.00	\$0.00			\$24.06	\$33.05

Special Calculation Note : Apprentice Rates For: Computer Operator, Router, Plastic-Wood Fabricator Vinyl Application
 1000 hrs 50% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.99

2000 hrs 55% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37
 3000 hrs 65% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37
 4000 hrs 50% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37
 5000 hrs 70% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37
 6000 hrs 85% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37
 7000 hrs 90% plus (\$4.46 h&w)+(\$1.00 pension)+(\$0.25 apprentice training) + vacation \$0.37

Ratio :**Jurisdiction (* denotes special jurisdictional note) :**

ASHLAND, ASHTABULA, CUYAHOGA,
 ERIE, GEAUGA, LAKE, LORAIN, MEDINA,
 PORTAGE, RICHLAND, STARK, SUMMIT

Special Jurisdictional Note :**Details :**

Sign and display work shall include but not limited: to the making and installation of all signs and servicing of the same, lettering and pictorial work of any kind, including vinyl signs and vinyl substrates and the preparing for the finishing of same, be it by hand, brush, roller, spray, mechanical or computer aided and by any other method or process pertaining to same: they shall have control of all branches, methods and processes of screen process work: tube bending and display work such as creating, building and finishing of all display matter and its related operations used for advertising purposes, including all lettering whether it be done by hand, mechanical or computer aided or by any other method or process pertaining to same: the construction, erection and maintenance of all billboards and all communication advertising.

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 639 (Cleveland Area) Sign

Change # : CN01-2006Loc639Cleve

Craft : Painter Effective Date : 01/03/2006 Last Posted : 01/03/2006

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Painter Sign	\$20.20		\$3.13	\$3.25	\$0.20	\$1.96	\$0.00	\$0.00			\$28.74	\$38.84
Apprentice	Percent											
1000 hrs	40.00	\$8.08	\$3.13	\$3.25	\$0.20	\$1.07	\$0.00	\$0.00			\$15.73	\$19.77
2000 hrs	50.00	\$10.10	\$3.13	\$3.25	\$0.20	\$1.22	\$0.00	\$0.00			\$17.90	\$22.95
3000 hrs	60.00	\$12.12	\$3.13	\$3.25	\$0.20	\$1.37	\$0.00	\$0.00			\$20.07	\$26.13
4000 hrs	70.00	\$14.14	\$3.13	\$3.25	\$0.20	\$1.51	\$0.00	\$0.00			\$22.23	\$29.30
5000 hrs	75.00	\$15.15	\$3.13	\$3.25	\$0.20	\$1.59	\$0.00	\$0.00			\$23.32	\$30.89
6000 hrs	80.00	\$16.16	\$3.13	\$3.25	\$0.20	\$1.66	\$0.00	\$0.00			\$24.40	\$32.48
7000 hrs	85.00	\$17.17	\$3.13	\$3.25	\$0.20	\$1.74	\$0.00	\$0.00			\$25.49	\$34.07
8000 hrs	90.00	\$18.18	\$3.13	\$3.25	\$0.20	\$1.81	\$0.00	\$0.00			\$26.57	\$35.66

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

Jurisdiction (* denotes special jurisdictional note) :

- ALLEN, ASHLAND, ASHTABULA,
- AUGLAIZE, BELMONT, CARROLL,
- CHAMPAIGN, COLUMBIANA, COSHOCTON,
- CRAWFORD, CUYAHOGA, DEFIANCE, ERIE,
- FULTON, GEAUGA, GUERNSEY, HANCOCK,
- HARDIN, HARRISON, HENRY, HOLMES,

HURON, JEFFERSON, KNOX, LAKE, LOGAN,
LORAIN, LUCAS, MAHONING, MARION,
MEDINA, MERCER, MONROE, MORROW,
NOBLE, OTTAWA, PAULDING, PIKE,
PORTAGE, PUTNAM, RICHLAND,
SANDUSKY, SENECA, SHELBY, STARK,
SUMMIT, TRUMBULL, TUSCARAWAS, VAN
WERT, WASHINGTON, WAYNE, WILLIAMS,
WOOD, WYANDOT

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Painter Local 639 (D) Sign

Change # : CN01-2005Loc639D

Craft : Painter Effective Date : 12/12/2005 Last Posted : 12/12/2005

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Painter Sign Erector	\$15.25		\$3.65	\$1.45	\$0.10	\$1.34	\$0.00	\$0.00			\$21.79	\$29.41
Sign Fabricator	\$15.25		\$3.65	\$1.45	\$0.10	\$1.34	\$0.00	\$0.00			\$21.79	\$29.41
Serviceman	\$15.25		\$3.65	\$1.45	\$0.10	\$1.34	\$0.00	\$0.00			\$21.79	\$29.41
Apprentice	Percent											
0-6 Months	60.00	\$9.15	\$3.65	\$1.45	\$0.10	\$0.94	\$0.00	\$0.00			\$15.29	\$19.87
6-12 Months	65.00	\$9.91	\$3.65	\$1.45	\$0.10	\$0.99	\$0.00	\$0.00			\$16.10	\$21.06
12-18 Months	70.00	\$10.67	\$3.65	\$1.45	\$0.10	\$1.04	\$0.00	\$0.00			\$16.91	\$22.25
18-24 Months	75.00	\$11.44	\$3.65	\$1.45	\$0.10	\$1.09	\$0.00	\$0.00			\$17.73	\$23.45
24-30 Months	80.00	\$12.20	\$3.65	\$1.45	\$0.10	\$1.14	\$0.00	\$0.00			\$18.54	\$24.64
30-36 Months	85.00	\$12.96	\$3.65	\$1.45	\$0.10	\$1.19	\$0.00	\$0.00			\$19.35	\$25.83
36-42 Months	90.00	\$13.73	\$3.65	\$1.45	\$0.10	\$1.24	\$0.00	\$0.00			\$20.16	\$27.03
42-48 Months	95.00	\$14.49	\$3.65	\$1.45	\$0.10	\$1.29	\$0.00	\$0.00			\$20.98	\$28.22

Special Calculation Note : Add .75 cents increase per hour for high pay over 40 feet.

Ratio :

3 Journeymen to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

CARROLL, COSHOCTON, HOLMES, KNOX, STARK, TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: **Plumber Pipefitter Local 94**

Change # : LCN01-2013fbLoc94

Craft : Plumber/Pipefitter Effective Date : 05/01/2013 Last Posted : 04/10/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Plumber Pipefitter	\$32.08		\$6.78	\$4.64	\$0.62	\$0.00	\$3.90	\$0.00	\$0.00	\$0.00	\$48.02	\$64.06
Apprentice	Percent											
1st 6 months	40.00	\$12.83	\$6.78	\$0.00	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$21.83	\$28.25
2nd 6 months	45.00	\$14.44	\$6.78	\$0.00	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$23.44	\$30.65
3rd 6 months	50.00	\$16.04	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$25.54	\$33.56
4th 6 months	55.00	\$17.64	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$27.14	\$35.97
5th 6 months	60.00	\$19.25	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$28.75	\$38.37
6th 6 months	65.00	\$20.85	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$30.35	\$40.78
7th 6 months	75.00	\$24.06	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$33.56	\$45.59
8th 6 months	80.00	\$25.66	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$35.16	\$48.00
9th 6 months	85.00	\$27.27	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$36.77	\$50.40
10th 6 months	90.00	\$28.87	\$6.78	\$0.50	\$0.62	\$0.00	\$1.60	\$0.00	\$0.00	\$0.00	\$38.37	\$52.81

Special Calculation Note : No special calculations for this skilled craft wage rate are

required at this time.

Ratio :

3 Journeymen to 1 Apprentice thereafter

Jurisdiction (* denotes special jurisdictional note) :

CARROLL*, STARK, WAYNE

Special Jurisdictional Note : In Carroll County the following townships are included: Brown, Augusta, East, Harrison, Washington, Center and Fox.

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: **Roofer Local 88**

Change # : LCN01-2013fbLoc88

Craft : Roofer Effective Date : 06/05/2013 Last Posted : 06/05/2013

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Roofer	\$24.00	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$37.76	\$49.76
HELPERS											
1st year Helper - 500 1st 6 months	\$10.00	\$8.00	\$0.00	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$18.24	\$23.24
1st year Helper - 500 w/12 months	\$12.00	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$25.76	\$31.76
2nd year Helper - w/12 months	\$13.44	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$27.20	\$33.92
3rd year Helper - w/12 months	\$14.88	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$28.64	\$36.08
4th year Helper - w/12 months	\$16.32	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$30.08	\$38.24
5th year Helper - w/12 months	\$17.76	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$31.52	\$40.40
6th year Helper	\$19.20	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$32.96	\$42.56
Apprentice	Percent										

1st 6 months w/500 hrs	50.00	\$12.00	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$25.76	\$31.76
2nd 6 months w/500 hrs	56.00	\$13.44	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$27.20	\$33.92
3rd 6 months w/500 hrs	62.00	\$14.88	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$28.64	\$36.08
4th 6 months w/500 hrs	68.00	\$16.32	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$30.08	\$38.24
5th 6 months w/500 hrs	74.00	\$17.76	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$31.52	\$40.40
6th 6 months w/500 hrs	80.00	\$19.20	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$32.96	\$42.56
7th 6 months w/500 hrs	86.00	\$20.64	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$34.40	\$44.72
8th 6 months w/500 hrs	92.00	\$22.08	\$8.00	\$5.52	\$0.12	\$0.00	\$0.00	\$0.12	\$0.00	\$0.00	\$35.84	\$46.88

Special Calculation Note : Roofers working in any form of coal tar pitch, whether hot or cold, installing and/or removing will be paid \$.25 more per hour. Other \$0.12 is for C.I.D.B.

Ratio :

No helper shall be used on any one job unless 1 Journeymen, and 1 Apprentices are working on said job .One (1) Journeymen to One (1) Apprentice to One (1) Helper

Jurisdiction (* denotes special jurisdictional note) :

ASHLAND, CARROLL, COSHOCTON, CRAWFORD, HOLMES, HURON, LORAIN*, MEDINA, PORTAGE, RICHLAND, SENECA, STARK, SUMMIT, TUSCARAWAS, WAYNE

Special Jurisdictional Note : In Lorain County (South of the Turnpike)

Details :

Prevailing Wage Rate Skilled Crafts

Name of Union: Sheet Metal Local 33 (Akron) Decking

Change # : CN01-2009Loc33(Akron)Deck

Craft : Sheet Metal Worker Effective Date : 09/24/2009 Last Posted : 09/24/2009

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Sheet Metal Worker Decking & Siding	\$20.06		\$6.31	\$6.35	\$0.38	\$0.00	\$0.00	\$0.98			\$34.08	\$44.11
Decking & Siding Specialty Trainees	Percent											
1st 30 days	64.25	\$12.89	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00			\$12.89	\$19.33
2nd thru 6th months	64.25	\$12.89	\$6.31	\$6.35	\$0.00	\$0.00	\$0.00	\$0.00			\$25.55	\$31.99
7th thru 12th months	64.28	\$12.89	\$6.31	\$6.35	\$0.38	\$0.00	\$0.00	\$0.98			\$26.91	\$33.36
2nd year	78.56	\$15.76	\$6.31	\$6.35	\$0.38	\$0.00	\$0.00	\$0.98			\$29.78	\$37.66

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

Jurisdiction (* denotes special jurisdictional note) :

3 Journeymen To 1 Apprentice

ASHLAND, CARROLL, COSHOCTON,
CRAWFORD, HOLMES, MEDINA, PORTAGE,
RICHLAND, STARK, SUMMIT,
TUSCARAWAS, WAYNE

Special Jurisdictional Note :

Details :

Work but not limited to:Exterior application of manufactured and/or job site fabricated metal decking, siding and exterior appurtenances thereto. The erection of pre-engineered metal buildings, pre-manufactured gas stations and appurtenances thereto. The installation of metal roofs and appurtenances. The erection and/or job site fabrication of draft or fire curtains and appurtenances thereto.

5-7 Journeymen to 3 Apprentice
8-10 Journeymen to 4 Apprentice
11-13 Journeymen to 5 Apprentice
14, 15 Journeymen to 6 Apprentice
and maintaining a three to one apprentice ratio
thereafter.

Special Jurisdictional Note :

Details :

Scope of Work: This Agreement covers the rates of pay and conditions of employment of all employees of the Employer engaged in, but not limited to, the a) manufacture, fabrication, assembling, handling, erection, installation, dismantling, conditioning, adjustment, alteration, repairing and servicing of all ferrous or non-ferrous metal work and all other materials used in lieu thereof and of all HVAC systems, air-veyor systems, exhaust systems, and air handling systems regardless of material used, including the setting of all equipment and all reinforcements in connection therewith; (b) all lagging over insulation and all duct-lining; (c) testing, servicing, and balancing of all air-handling equipment and duct work; (d) the preparation of all shop and field sketches, whether manually drawn or computer assisted, used in fabrication and erection, including those taken from original architectural and engineering drawings or sketches, and (e) metal roofing; and (f) all other work included in the jurisdictional claims of Sheet Metal Worker's International Association.

Prevailing Wage Rate Skilled Crafts

Name of Union: Sprinkler Fitter Local 669

Change # : LCN01-2013fbLoc669

Craft : Sprinkler Fitter Effective Date : 08/21/2013 Last Posted : 08/21/2013

	BHR		Fringe Benefit Payments					Irrevocable Fund		Total PWR	Overtime Rate	
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)			MISC (*)
Classification												
Sprinkler Fitter	\$32.52		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.50	\$0.00	\$0.00	\$52.11	\$68.37
Indentured prior to April 2010												
50%	\$16.26		\$7.45	\$0.00	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$24.41	\$32.54
50%	\$16.26		\$7.45	\$0.00	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$24.41	\$32.54
55%	\$17.89		\$8.42	\$5.50	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$32.51	\$41.46
60%	\$19.51		\$8.42	\$5.50	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$34.13	\$43.89
65%	\$21.14		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$40.23	\$50.80
70%	\$22.76		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$41.85	\$53.23
75%	\$24.39		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$43.48	\$55.68
80%	\$26.02		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$45.11	\$58.12
85%	\$27.64		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$46.73	\$60.55
90%	\$29.27		\$8.42	\$5.50	\$0.45	\$0.00	\$4.72	\$0.00	\$0.00	\$0.00	\$48.36	\$63.00
Apprentice	Percent											
Indentured on or after April 2010	45.00	\$14.63	\$7.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$22.53	\$29.85
CLASS 2	50.00	\$16.26	\$7.45	\$0.00	\$0.45	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$24.16	\$32.29
CLASS 3	55.00	\$17.89	\$8.42	\$5.50	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$32.51	\$41.45
CLASS 4	60.00	\$19.51	\$8.42	\$5.50	\$0.45	\$0.00	\$0.25	\$0.00	\$0.00	\$0.00	\$34.13	\$43.89
CLASS 5	65.00	\$21.14	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$36.01	\$46.58
CLASS 6	70.00	\$22.76	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$37.63	\$49.02
CLASS 7	75.00	\$24.39	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$39.26	\$51.46
CLASS 8	80.00	\$26.02	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$40.89	\$53.89

CLASS 9	85.00	\$27.64	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$42.51	\$56.33
CLASS 10	90.00	\$29.27	\$8.42	\$5.50	\$0.45	\$0.00	\$0.50	\$0.00	\$0.00	\$0.00	\$44.14	\$58.77

Special Calculation Note : Other \$0.50 is for Industry Advancement. No special calculations for this skilled craft wage rate are required at this time.

Ratio :

1 Journeyman to 1 Apprentice

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, HURON, JACKSON, JEFFERSON, KNOX, LAWRENCE, LICKING, LOGAN, LUCAS, MADISON, MAHONING, MARION, MEDINA, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PORTAGE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note :

Details :

Sprinkler Fitter work shall consist of the installation, dismantling, maintenance, repairs, adjustments, and corrections of all fire protection and fire control systems including the unloading, handling by hand, power equipment and installation of all piping or tubing, appurtenances and equipment pertaining thereto, including both overhead and underground water mains, fire hydrants and hydrant mains, standpipes and hose connections to sprinkler systems used in connection with sprinkler and alarm systems. Also all tanks and pumps connected thereto, also included shall be CO-2 and Cardox Systems, Dry Chemical Systems, Foam Systems and all other fire protection systems.

Prevailing Wage Rate Skilled Crafts

Name of Union: Truck Driver Bldg & HevHwy Class 1
Locals 20,40,92,92b,100,175,284,438,377,505,637,908,957

Change # : CN1-2011jcBldgHevHwy

Craft : Truck Driver **Effective Date :** 06/29/2011 **Last Posted :** 06/29/2011

	BHR		Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
			H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification												
Truck Driver CLASS 1 4 wheel service, dump, and batch trucks, Oil Distributor - Asphalt Distributor-Tandems	\$22.78		\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$35.39	\$46.78
Apprentice	Percent											
First 6 months	80.00	\$18.22	\$6.11	\$4.90	\$0.50	\$0.00	\$0.00	\$0.00			\$29.73	\$38.85
7-12 months	85.00	\$19.36	\$6.11	\$4.90	\$0.50	\$0.00	\$0.00	\$0.00			\$30.87	\$40.55
13-18 months	90.00	\$20.50	\$6.11	\$4.90	\$0.50	\$0.00	\$0.00	\$0.00			\$32.01	\$42.26
19-24 months	95.00	\$21.64	\$6.11	\$4.90	\$0.50	\$0.00	\$0.00	\$0.00			\$33.15	\$43.97
25-30 months	100.00	\$22.78	\$6.11	\$4.90	\$0.50	\$0.00	\$0.00	\$0.00			\$34.29	\$45.68

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

3 Journeymen to 1 Apprentice
per company/project

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, HURON, JACKSON, JEFFERSON, KNOX, LAWRENCE, LICKING, LOGAN, LORAIN, LUCAS, MADISON, MAHONING, MARION, MEDINA, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PORTAGE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note :

Details :

** Asphalt - Oil spray bar man when operating from cab shall receive \$0.20 cents per hour above their Basic Hourly Rate.

Prevailing Wage Rate Skilled Crafts

Name of Union: Truck Driver Bldg & HevHwy Class 2
Locals 20,40,92,92b,100,175,284,438,377,505,637,908,957

Change # : CN1-2011BldgHevHwy

Craft : Truck Driver **Effective Date :** 06/29/2011 **Last Posted :** 06/29/2011

	BHR	Fringe Benefit Payments						Irrevocable Fund		Total PWR	Overtime Rate
		H&W	Pension	App Tr.	Vac.	Annuity	Other	LECET (*)	MISC (*)		
Classification											
Truck Driver CLASS 2	\$23.20	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$35.81	\$47.41
Tractor											
Trailer-Semi											
Tractor											
Trucks-Pole											
Trailers-Ready Mix											
Trucks-Fuel											
Trucks-Asphalt-Oil											
Spray bar											
men- 5 Axle & Over -Belly											
Dumps-End											
Dumps-Articulated											
Dump Trucks-Low boys-											
Heavy duty Equipment (irrespective of load carried) when used exclusively for transportation-											
Truck Mechanics (when needed)											

Apprentice	Percent										
First 6 months	80.00	\$18.56	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$31.17 \$40.45
7-12 months	85.00	\$19.72	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$32.33 \$42.19
13-18 months	90.00	\$20.88	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$33.49 \$43.93
19-24 months	95.00	\$22.04	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$34.65 \$45.67
25-30 months	100.00	\$23.20	\$6.81	\$5.70	\$0.10	\$0.00	\$0.00	\$0.00			\$35.81 \$47.41

Special Calculation Note : No special calculations for this skilled craft wage rate are required at this time.

Ratio :

3 Journeymen to 1 Apprentice per company/project

Jurisdiction (* denotes special jurisdictional note) :

ADAMS, ALLEN, ASHLAND, ASHTABULA, ATHENS, AUGLAIZE, BELMONT, BROWN, BUTLER, CARROLL, CHAMPAIGN, CLARK, CLERMONT, CLINTON, COLUMBIANA, COSHOCTON, CRAWFORD, DARKE, DEFIANCE, DELAWARE, ERIE, FAIRFIELD, FAYETTE, FRANKLIN, FULTON, GALLIA, GREENE, GUERNSEY, HAMILTON, HANCOCK, HARDIN, HARRISON, HENRY, HIGHLAND, HOCKING, HOLMES, HURON, JACKSON, JEFFERSON, KNOX, LAWRENCE, LICKING, LOGAN, LORAIN, LUCAS, MADISON, MAHONING, MARION, MEDINA, MEIGS, MERCER, MIAMI, MONROE, MONTGOMERY, MORGAN, MORROW, MUSKINGUM, NOBLE, OTTAWA, PAULDING, PERRY, PICKAWAY, PIKE, PORTAGE, PREBLE, PUTNAM, RICHLAND, ROSS, SANDUSKY, SCIOTO, SENECA, SHELBY, STARK, SUMMIT, TRUMBULL, TUSCARAWAS, UNION, VAN WERT, VINTON, WARREN, WASHINGTON, WAYNE, WILLIAMS, WOOD, WYANDOT

Special Jurisdictional Note :

Details :

** Asphalt - Oil spray bar man when operating from cab shall receive \$0.20 cents per hour above

their Basic Hourly Rate.

APPENDIX

B

Bid Forms

Bid Form 1

AUTHORITY OF BID SIGNATORY

The bidder shall indicate which of the following is the source of the bid signatory's authority to sign the bid on behalf of the bidder. The bidder shall follow the instructions noted.

- _____ The party bidding is a sole partnership. Below the signature affixed on the Proposal Sheet, a sole proprietorship's owner shall write "sole owner" or "doing business as (name of bidder)".

- _____ The party bidding is a partnership and the party signing is one of the partners. Below the signature affixed on the proposal sheet, a signatory for a partnership shall write "member of the firm".

- _____ The party is a corporation. The party signing is authorized to sign on behalf of the corporation. A copy of the resolution of the corporation's board of directors which delegates signatory authority to the individual signing is to be attached to this bid form. This resolution can be a general delegation of authority for signing bids or can be a specific authorization for this project. The secretary of the corporation shall authenticate the resolution as currently being in full force and effect.

- _____ Signatory authority is evidenced by other means noted below:

Bid Form 2

INSERT BID GUARANTY HERE

Each proposal shall be accompanied by a bid guarantee which shall consist of one of the following:

Ohio Statutory Bid Guaranty and Contract Bond must be substantially in the form prescribed by ORC 153.571. The 153.571 statutory bond forms require that the penal amount be an amount not less than the bid price. It is a bid error to write in an amount equal to ten percent (10%) of the amount bid.

NOTE: Make a certified check or cashier's check in an amount not less than ten percent (10%) of the total amount bid for all items of the proposal. Such a bid guarantee check shall be made payable to the OWNER without condition.

Bidders using the Ohio Statutory Bid Guaranty and Contract Bond Form can leave the penal amount blank, if such is acceptable to the bidder and the surety. The statutory bond form, per ORC 153.571, the penal amount equal to the price bid, if the amount is left blank.

In case a bidder to whom a contract award is made shall fail to execute and secure a contract within ten (10) days after notice of award in writing, the award shall be vacated and the bid guarantee, in an amount not to exceed ten percent (10%) of the amount bid, forfeited.

An approved surety company must provide bid Bond. This company must be authorized to transact business in the State of Ohio and with local agent. Agents of bonding companies shall be licensed to conduct business in the State of Ohio and have a local (Ohio) agent. Each bid shall contain the power of attorney, bearing the seal of the company and evidencing such agent's authority to execute the documents furnished. Identification of the local agent is to accompany each Bond.

The surety used for the bid bond shall be listed in the current edition of the U.S. Treasury Circular 570 and the Penal Sums shall be within the maximum specified for such company in said Circular 570.

BIDDER INFORMATION

- 1. The Bidder shall provide the following information as part of its bid.
 - a. Name of Bidder _____
 - b. Business Address _____
_____ City _____ State _____ Zip
 - c. Business Telephone Number (____) _____
 - d. Person, address, **email** and telephone to whom official notices are to be sent _____

 - e. Person, address, **email** and telephone for further information regarding this proposal _____

 - f. State(s) of incorporation (w/dates of incorporation) _____

 - g. Principal place of business _____
 - h. ~~Working days necessary to complete project~~ _____ N/A _____ days
 - i. Federal I.D. Number # _____
 - j. Amount of Certified Check, Cashier's Check, Bid Bond \$ _____

2. Form of Business Organization.

____ Corporation

____ Partnership

____ Other

3. The bidder shall provide the names and addresses of all persons interested as principals (officers, partners, and associates) in this proposal. Write first name in full, and give titles for offices.

_____	_____
_____	_____
_____	_____
_____	_____

All of the above, including the signatory to this bid, are citizens of the United States, except the following. (Provide names and addresses of those not a citizen of the United States.)

_____	_____
_____	_____
_____	_____
_____	_____

4. Name and address of other person, firms or companies interested in this contract.

_____	_____
_____	_____
_____	_____
_____	_____

The undersigned certifies that the bidder has the facilities, ability and financial resources available for the fulfillment of the contract if such be awarded to said bidder.

Upon request, the bidder will be expected to amplify the foregoing statements as necessary to satisfy the OWNER concerning his ability to successfully perform the work in a satisfactory manner.

Signed this _____ day of _____, 20 _____.

Contractor

By _____
(Signature of individual, partner or officer signing the proposal.)

Please have this page Notarized

Bid Form 4

PROJECT REFERENCES

Each bidder shall provide a list of comparable projects performed over the last three (3) years (maximum of 10) indicating the following:

- Owner (with name, address and telephone number of Owner's project manager).
- General description of work, and size and type of project. Also indicate whether participation was as a prime or subcontractor. If the bidder's participation on the project was as a subcontractor, identify prime contractor with information requested above for the OWNER.

All previous work for the OWNER over the last five (5) years should be identified.

INSURANCE AFFIDAVIT

Each bidder shall obtain from its insurance representative and include in the bid submittal an insurance affidavit that contains the representations noted below. Make the affidavit on the insurance agency's letterhead, reference this project by name, and state at least the following:

- (1.) The representative has reviewed and understands the insurance requirements (including the cancellation/non-renewal provisions) set forth in "General Conditions" § 1.14 Insurance.
- (2.) The representative certifies that the company will provide the specified insurance should the contract be awarded to the contractor on whose behalf the certificate is being provided.
- (3.) The names and A.M. Best Company ratings of companies required to provide the required insurance.

You must have the insurance affidavit notarized.

“General Conditions” INSURANCE § 1.14

- A. The following standard indemnity agreement and minimum insurance requirements are incorporated in the Specifications for all work performed by the Contractor for the Owner, its affiliated and associated organizations or subsidiaries, hereinafter referred to as Owner.
 - I. The Contractor agrees to indemnify and save the Owner harmless from and against any and all costs, loss and expense, liability damages, or claims for damages, including cost for defending any action, on account of any injury to persons (including death) or damage to or destruction of property of the Owner, arising or resulting from the work provided for or performed, or from any act, omission, or negligence of the Contractor, Subcontractor and his or their agents or employees. The foregoing provisions shall in no way be deemed released, waived or modified in any respect by reason of any insurance or surety provided by the Contractor.

- II. The Contractor shall maintain insurance of the kinds and in amounts specified in the attached schedule and furnish the Service Director with Certificates of Insurance as evidence thereof in the prescribed form. If any work provided for or to be performed under any Specifications is sublet (as otherwise permitted by the terms of such Specifications), the Contractor shall require the sub-contractors to maintain and furnish him with satisfactory evidence of Workmen's Compensation, Employers' Liability and such other forms and amounts of insurance which Contractor deems reasonably adequate.
- III. In accordance with Item II, the Contractor shall maintain the following insurance:
1. Workmen's Compensation and Employer's Liability
Insurance affording,
 - (a) protection under the Workmen's Compensation Law in the State of Ohio.
 - (b) Employer's Liability protection subject to a minimum limit of \$100,000.00.
 2. Commercial General Liability Insurance in amounts not less than:

General Aggregate Limit	\$2,000,000.00
Products - Completed Operations Aggregate Limit	\$2,000,000.00
Personal and Advertising Injury Limit	\$1,000,000.00
Each Occurrence Limit	\$1,000,000.00
Fire Damage Limit	\$50,000.00
Medical Expense Limit	\$5,000.00

This insurance shall:

- a. include coverage for the liability assumed by Contractor under Item I (Indemnity);
- b. not to be subject to any of the special property damage liability exclusions commonly referred to as the XCU exclusions pertaining to blasting or explosion, collapse or structural damage and underground property;
- c. not be subject to any exclusion of property used by the insured or property in the care, custody or control of the insured or property as to which the insured for any purpose is exercising physical control unless the required Builders Risk or Installation Floater coverage is indicated

on the required Certificate of Insurance (Item III.4);

- d. and the Certificates of Insurance furnished by the Contractor shall show by specific reference that each of the foregoing items have been provided for.
- e. **INCLUDE THE CITY OF CANTON, OHIO AND ITS AGENTS, AS ADDITIONAL INSURED FOR PURPOSES OF COVERAGE UNDER THE SUBJECT POLICY.**

- 3. Comprehensive Automobile Liability Insurance in the following minimum amounts:

Bodily Injury and Property Damage any one accident or loss:	\$1,000,000.00
----------------------------------------------------------------	----------------

- 4. The contractor will provide and maintain Installation/Builders Risk Insurance to protect the interests of both the contractor and the owner for materials transported to the job, stored or installed on the premises, or stored at any temporary location off premises. Such insurance shall be written on an "All Risk" form to include the perils of Fire, Extended Coverage, Vandalism, Malicious Mischief, Theft, Collapse and Water Damage. The amount of Insurance shall be 100% of the insurable value of the work performed. It should include all items of labor and materials incorporated therein, materials in storage, on or off the job site, scheduled for use in completing the work, and such other supplies and equipment incidental to the work as are not owned or rented by the contractor, the cost of which is included in the direct cost of the work. This Insurance shall not cover any tools, derricks, machinery, tar buckets, ladders, engines, workmen's quarters, boilers, pumps, wagons, scaffolds, forms, compressors, shanties or other items owned or rented by the Contractor, the cost of which is not included in the direct cost of the work.

- B. The Certificates of Insurance furnished by the Contractor as evidence of the Insurance maintained by him shall include a clause obligating the Contractor to give the Service Director ten (10) days prior written notice for cancellation or any material change in the insurance.

are the only party or parties interested with the party making this bid in the profits of any contract which may result from the herein contained proposal; that the said proposal is made without any connection or interest in the profits thereof with any other person making any other bid or proposal for said work; that no member of the City of Canton, head of any department or bureau or employee therein or any official or officer of City of Canton, is directly or indirectly interested therein; that said proposal or bid is genuine and not collusive or sham; that said bidder has not colluded, conspired, connived, or agreed, directly or indirectly, with any bidder or person, to put in a sham bid, or that such person shall refrain from bidding, and has not in any manner, directly or indirectly, sought by agreement or collusion, or communication or conference, with any person, to fix the bid price of affiant or any other bidder, or to fix any overhead, profit or cost element of said bid price, or of that of any other bidder, or to secure any advantage against the OWNER, or any person interested in the proposed contract; and that all statements contained in said proposal or bid are true; that such bidder has not, directly or indirectly submitted this bid, or the contents thereof, or divulged information or data relative thereto any association or to any member or agent thereof; and further says that all the statements made by him in said proposal or bid are true.

Affiant

Sworn to and subscribed before me this _____ day of
_____, 20 ____.

Notary Public in and for

_____ County,

My Commission Expires:

_____, 20 ____.

BIDDER'S AFFIDAVIT: FOREIGN CORPORATION*

The undersign certifies that _____ is a foreign corporation incorporated in the State of _____, whose principal place of business is _____ and is required to obtain authorization to transact business in the State of Ohio.

The undersigned bidder further certifies that said authorization has been obtained and is in effect and the bidder has a designated statutory agent upon whom process against bidder corporation may be served within the State of Ohio. The designated

statutory agent is _____
(name and address)

Process served upon the designated statutory agent named above shall be effective service, unless the Owner has been informed, by certified mail or its equivalent (return receipt), of a change in the agent upon whom process can be served.

Date

Signed

Title

Note: This statement is to be reproduced on the bidder's letterhead, signed by the authorized bid signatory, notarized and submitted with the bid.

***Any corporation that is not incorporated in the State of Ohio is a foreign corporation.**

LISTING OF SUBCONTRACTORS

The Bidder shall set forth the name, location of principal place of business, proposed amount of subcontract and type of work to be performed of each subcontractor who will perform work or labor or render service, as listed, to the bidder in or about the construction of the work or improvement to be performed under the Contract for which the attached Bid is submitted, and where the portion of the work which will be performed by each subcontractor. Note that subcontractors are distinguishable from suppliers.

Subcontractor - An individual or entity having a direct contract with CONTRACTOR or with any other Subcontractor for the performance of a part of the work at the site.

Supplier - A manufacturer, fabricator, supplier, distributor, material man, or vendor having a direct contract with CONTRACTOR or with any Subcontractor to furnish materials or equipment to be incorporated in the work by the CONTRACTOR or any Subcontractor.

The Bidder understands that if he fails to specify a subcontractor for any portion of the work to be performed under the Contract, he shall be deemed to have agreed to perform such portion itself.

PLEASE FILL OUT THIS FORM AND RETURN PROMPTLY TO THE ADDRESS BELOW
 BIDDER AND CONTRACTOR EMPLOYMENT PRACTICES REPORT

Minority Coordinator
 218 Cleveland Avenue SW
 Canton, Ohio 44702

I. INSTRUCTIONS

A. **EQUAL EMPLOYMENT OPPORTUNITY REQUIREMENT:** This form is designed to provide an evaluation of your policies and practices relating to the extension of equal employment opportunity to all persons without regard to race, religion, color, sex or national origin.

Ordinance No. 179-74 of the City of Canton and the rules and regulations pursuant thereto provide for a contract compliance inspection of personnel policies and practices related to any contract with the City including contracts for work, labor, services, supplies, equipment, materials, leases, concession agreements, and permits.

B. **CONTRACTOR AND BIDDER PERFORMANCE:** Completion of this Contractor and Bidder Employment Practices Report is one of the steps which demonstrates compliance with the City's Equal Employment Opportunity Program. Responsibility for demonstrating compliance with the Program by the contractor and his subcontractors rests with the contractor or subcontractor. Such demonstration is a prerequisite for continued eligibility for bidding on city contracts, or for continuing in contract with the City.

II. CONTRACTOR AND BIDDER INFORMATION

1. REPORTING STATUS			
<input type="checkbox"/> a. Prime Contractor	<input type="checkbox"/> b. Prime Subcontractor	<input type="checkbox"/> c. Supplier	<input type="checkbox"/> d. Other (Specify)
2. NAME, ADDRESS AND TELEPHONE NUMBER OF BIDDER COVERED BY THIS REPORT			
3. NAME, ADDRESS AND TELEPHONE NUMBER OF PRINCIPAL OFFICIAL OR MANAGER OF BIDDER			
4. NAME, ADDRESS AND TELEPHONE NUMBER OF PRINCIPAL OFFICE OF BIDDER			
5. CONTRACTING CITY AGENCY (OR AGENCIES)			
6. SIGNATURE AND TITLE OF AUTHORIZED EQUAL EMPLOYMENT OPPORTUNITY REPRESENTATIVE DATE			

EVALUATION (level blank)

Compliance

Non-Compliance

Follow-up _____

III. POLICIES AND PRACTICES

The bidder and the Contractor will indicate his willingness or unwillingness to comply with the requirements of the Equal Employment Opportunity Program of the City of Canton by encircling the appropriate or applicable letter to the left of each item below. The letters are to be interpreted as follows:

- A - This is now a practice of the Company.
- B - The Company will adopt this policy.
- C - The Company cannot or will not adopt this policy. (If "C" is circled, state reason. Use separate sheet if additional space is needed.)

It is understood that the Company's willingness to participate in the Equal Employment Opportunity Program will be evaluated by the Office of Directors of Contract Compliance. This evaluation will directly influence our decision on the qualifications of each bidder and contractor, and is an integral part of your bid.

CIRCLE ONE	ITEMS	STATE REASON IF (C) IS CIRCLED
A B C	1. The Company will adopt a policy of non-discrimination on the basis of race, religion, color, sex, or national origin with regard to recruitment, hiring, training, upgrading, promotion and discipline of employees or applicants for employment.	
A B C	2. The Company will develop procedures which will assure that this policy is understood and carried out by managerial, administrative, supervisory personnel.	
A B C	3. The Company will state its non-discriminatory policy in writing and communicate it to the following: a. All employees d. All relevant employee organizations including labor unions b. All recruitment sources c. All subcontractors	
A B C	4. The Company will use recruitment sources such as employment agencies, unions, and schools which have a policy of referring applicants on a non-discriminatory basis.	
A B C	5. The Company will participate in training programs for the benefit of employees or prospective employees, according to the intent of City Ordinance Number 179-74.	
A B C	6. Company recruiters will seek a broad recruitment base in order that a representative cross-section of applications might be obtained, and will refrain from a hiring policy which limits job applicants to persons recommended by company personnel.	
A B C	7. The Company will take steps to integrate any position, departments, or plant locations which have no minority persons including African Americans or are almost completely staffed with one particular ethnic or racial group.	
A B C	8. The Company will review its qualifications for each job to determine whether such standards eliminate unemployed persons who could, if hired, perform the duties of the job adequately. The following qualifications should be reviewed: a. education c. tests b. experience d. arrest records	
A B C	9. Residence in a particular geographical area will not be a qualifying or disqualifying criterion for employment with the Company.	
A B C	10. The Company will provide that all bargaining agreements with employee organizations, including labor unions, have non-discrimination clauses requiring equal employment opportunity.	

IV. EMPLOYMENT DATA

Please note that this data may be obtained by visual survey or post-employment records. Neither visual surveys nor post-employment records are prohibited by any Federal, State or local law. All specified data are required to be filled in by law.

JOB CATEGORIES	ALL EMPLOYEES			MINORITY GROUP EMPLOYEES								
	TOTAL MALE & FEMALE	MALE	FEMALE	MALE				FEMALE				
				African American	Asian American	Native American	Hispanic	African American	Asian American	Native American	Hispanic	
Officials, Mgrs and Supervisors												
Professionals												
Technicians												
Part-Time Seasonal												
Office and Clerical												
Craftsmen (Skilled)												
Operatives (Semi-skilled)												
Laborers (Unskilled)												
Service Workers												
TOTAL												
Total employment from previous report (if any)												

REMARKS Use this space to give any identification data appearing on last report which differs from that given above, explain major changes in employment, changes in composition of reporting units, and other pertinent information.

The undersigned certifies that he is legally authorized by the bidder to make the statements and representations contained in this report. That he has read all of the foregoing statements and representations and that they are true and correct to the best of his knowledge and belief. The undersigned, understands that if any of the statements and representations are made knowing them to be false or there is a failure to implement any of the stated intentions or objectives, set forth herein, without prior notice to the Office of Contract Compliance, the bidder will be subject to the loss of all future awards.

FIRM OR CORPORATE NAME _____

DATE OF SIGNING _____

SIGNATURE _____

TITLE _____

SIGNATURE _____

TITLE _____

V. ADDITIONAL INFORMATION (OPTIONAL)

Describe any other actions taken which show that all employees are recruited, hired, trained, and promoted without regard to their race, religion, color, sex, or national origin. Use separate sheet if additional space is required.

DESCRIPTION OF OCCUPATIONAL CATEGORIES

Officials, managers and supervisors - Occupations requiring administrative personnel who set broad policies, exercise over-all responsibility for execution of these policies, and direct individual departments or special phases of a firm's operations. Includes officials, executives, middle management, plant managers, department managers and superintendents, salaried foremen who are members of management, purchasing agents and buyers, and kindred workers.

Professionals - Occupations requiring either college graduation or experience of such kind and amount as to provide a comparable background. Includes accountants and auditors, airplane pilots and navigators, architects, artists, chemists, designers, dietitians, editors, engineers, lawyers, librarians, mathematicians, natural scientists, physicians, social scientists, teachers, and kindred workers.

Technicians - Occupations requiring a combination of basic scientific knowledge and manual skill which can be obtained through about 2 years of post high school education, such as is offered in many technical institutes and junior colleges, or through equivalent on-the-job training. Includes draftsmen, engineering aids, junior engineers, mathematical aids, nurses, photographers, radio operators, scientific assistants, surveyors, technical illustrators, technicians, (medical, dental, electronic physical sciences), and kindred workers.

Sales workers - Occupations engaging wholly or primarily in direct selling. Includes advertising agents and salesmen, insurance agents and brokers, stock and bond salesmen, demonstrators, salesmen and sales clerks and kindred workers.

Office and clerical - Includes all clerical type work regardless of level of difficulty, where the activities are predominantly nonmanual though some manual work not directly involved with altering or transporting the products is included. Includes bookkeepers, cashiers, collectors (bills and accounts), messengers and office boys, office machine operators, shipping and receiving clerks, stenographers, typists and secretaries, telegraph and telephone operators, and kindred workers.

Craftsmen (Skilled) - Manual workers of relatively high skill level having a thorough and comprehensive knowledge of the processes involved in their work. Exercise considerable independent judgement and usually receive an extensive period of training. Includes the building trades hourly paid foremen and leadmen who are not members of management, mechanics and repairmen, skilled machining occupations, compositors and typesetters, electricians, engravers, job setters (metal), motion picture projectionists, pattern and model makers, stationary engineers, tailors and tailoresses, and kindred workers.

Operatives - (Semi-Skilled) - Workers who operate machine or processing equipment or perform other factory-type duties of intermediate skill level which can be mastered in a few weeks and require only limited training.

Laborers (Unskilled) - Workers in manual occupations which generally require no special training. Perform elementary duties that may be learned in a few days and require no independent judgement. Includes garage laborers, car washers and greasers, gardeners (except farm) and groundskeepers, longshoremen and stevedores, lumbermen, raftsmen and wood choppers, laborers performing lifting, digging, mixing, loading, and pulling operations, and kindred workers.

Service workers - Workers in both protective and nonprotective service occupations. Includes attendants (hospital and other institution, professional and personal service), barbers, charwomen and cleaners, cooks (except household), counter and fountain workers, elevator operators, firemen and fire protection, guards, watchmen, and doorkeepers, stewards, janitors, policemen and detectives, porters, waiters and waitresses, and kindred workers.

Apprentices - Persons employed in a program including work training and related instruction to learn a trade or craft which is traditionally considered an apprenticeship, regardless of whether the program is registered with federal or State agency.

SECTION 105.06 - MINORITY CONTRACT PROVISIONS; MINORITY
 ENTERPRISE UTILIZATION COMMITMENT;

A) The Bidder agrees to expend at least \$ _____ of the Contract in the event the contract is awarded to such bidder for minority/women's business enterprises. For purposes of this pledge, the term "minority/women's business enterprise" means a bona fide business established as a sole proprietorship, partnership or corporation owned, operated and controlled by one or more minority persons or women who have at least fifty-one percent (51%) ownership. "Minority" includes African Americans, Asian/Pacific Islanders, Hispanic/Latino Americans and Native American Indians. The minority or woman must have operational and managerial control, interest in capital, and earnings commensurate with the percentage of ownership. Minority/women's business enterprises may be employed as construction contractors, subcontractors, vendors or suppliers. The Bidder must indicate the minority business enterprise it intends to utilize in this document as follows:

<u>Name/Address of Minority Firm</u>	<u>Nature of Participation</u>	<u>Dollar Value of Participation</u>
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____

Total Bid Amount: _____ Total _____

Percentage of Minority Enterprise Participation: _____ %

- B) The Bidder agrees to furnish implementation reports to indicate the minority business enterprises which it has or intends to utilize. The first report is due five (5) days after notification to the lowest and best bidder. The second report is due at 40% completion.
- C) It is the goal of the City that at least 10 percent (10%) of the total of all contracts be expended for a bona fide minority business enterprise.
- D) If the 10 percent (10%) minority business utilization cannot be met, a waiver can be granted by the Board of Control upon recommendation by the Service Director. To justify a waiver, it must be shown that every feasible attempt has been made to comply, and it must be demonstrated that sufficient, relevant, qualified minority business enterprises (which can perform sub-contracts or furnish supplies) are unavailable in the market area of the project to enable meeting the 10 percent (10%) minority business enterprise goal.
- E) Failure to comply with the Minority Business Enterprise Utilization Commitment will not be grounds for the forfeiture of a bid bond so long as a “best effort” approach can be demonstrated. If such compliance cannot be obtained, the bidder shall furnish written evidence to justify that he has made “best effort” to comply with the Minority Business Enterprise Assistance Program. A representative of the City of Canton will monitor and determine whether or not a good faith effort to comply with the Minority Business Enterprise Commitment has been made.
- F) In light of the above, the Board of Control will still award the contract to the lowest and best bidder. Breach of the commitment constitutes breach of the Bidder’s contract, if awarded.
- G) For information regarding the City’s Minority Business Enterprise Utilization Requirement, please contact the City of Canton’s Compliance Office.
- H) The undersigned hereby certifies that he/she has read the terms of the commitment and is authorized to bind the Bidder to the commitment herein set forth.

Name/Title of Authorized Officer	Signature of Authorized Officer
	Date

The additional bid requirements are as a result of legislation passed by City Council and are incorporated within the City Code and/or Codified Ordinances of the City of Canton. Detailed copies of these code requirements are available within the City Law Department, 7th Floor, City Hall.

EEO
POLICY STATEMENT

THE CITY OF CANTON, OHIO IN CONFORMANCE WITH LOCAL, STATE, AND FEDERAL REGULATIONS REQUIRE EACH EMPLOYER, CONTRACTOR, AND MATERIAL SUPPLIERS WORKING CITY PROJECTS TO BE SIGNATURES OF THE FOLLOWING STATEMENTS:

1. IT IS THE POLICY OF _____ THAT EQUAL EMPLOYMENT OPPORTUNITY BE AFORDED TO ALL QUALIFIED PERSONS WITHOUT REGARD TO RACE, RELIGION, SEX OR NATIONAL ORIGIN.
2. IN SUPPORT OF THIS DOCUMENT _____ WILL NOT DISCRIMINATE AGAINST ANY EMPLOYEE OR APPLICANT BECAUSE OF RACE, RELIGION, COLOR, SEX OR NATIONAL ORGIN.
3. THE _____ WILL TAKE AFFIRMATIVE ACTION TO INSURE THAT APPLICANTS ARE EMPLOYED AND THAT EMPLOYEES ARE TREATED DURING EMPLOYMENT WITHOUT REGARD TO THEIR RACE, RELIGION, COLOR SEX OR NATIONAL ORIGIN. SUCH ACTION WILL INCLUDE BUT NOT BE LIMITED TO:
RECRUITMENT, ADVERTISING OR SOLICITATION FOR EMPLOYMENT, HIRING, PLACEMENT, UPGRADING, TRANSFER OR DEMOTION, SELECTION FOR TRAINING INCLUDING APPRENTICESHIP RATES OF PAY OR OTHER FORMS OF COMPENSATION, LAYOFFS OR TERMINATION.
4. THE _____ WILL MAKE EVERY EFFORT TO COMPLY WITH MINORITY UTILIZATION GOALS AS FOLLOWS: (9%) NINE PERCENT MINORITIES IN WORKFORCE ON THIS JOB, (6.9%) SIX POINT NINE PERCENT FEMALE UTILIZATION ON THIS JOB, (10%) TEN PERCENT OF CONTRACT AMOUNT EXPENDED WITH MINORITY BUSINESS ENTERPRISES.
5. THE _____ SHALL REQUIRE EACH SUB-CONTRACTOR WE HIRE ON THIS PROJECT TO ADHERE TO, SIGN, AND RETURN THIS STATEMENT TO THE CITY.

(Date)

(Name of Company)

(Signature and Title of Company Officer)

PROJECT: **Trinity Place & Caprice Avenue NW Sanitary Manhole Rehabilitation,
G.P. 1147**

LETTER OF ASSURANCE

The _____ company hereby certifies that they will comply with the required goals and timetables pertaining to minority and female participation in all trades. The _____ company agrees to comply with the required 10% minority participation goal.

All bidders, contractors and subcontractors to perform work on _____ are subject to the above stated requirements and agree to comply with all local, state and Federal EEO, MBE, and labor requirements applicable to this project and further agree to complete and/or submit all necessary documents to the City of Canton's Compliance Office prior to the awarding of any contract for this project.

The _____ company also agrees to expend at least 10% of the dollar amount of any contract awarded for this project to Minority Business Enterprises.

Failure to submit this letter of assurance will make the bidder's bid non-valid and failure to comply with the applicable local, state and Federal EEO, MBE and labor requirements are basis for termination of any contract awarded for this project.

_____	_____
Company or Partnership	Federal ID #
_____	_____
President or Other Official Title	Telephone #

Date	

(Seal)
Subscribed and sworn to before me, this _____ day of _____, 20 _____.

Notary Public in and for the County of _____, State of _____.

My commission expires on the _____ day of _____, 20 _____.

TO BE FILLED OUT WITH BID

**NOTICE OF FACTORS TO BE CONSIDERED IN DETERMINING
THE LOWEST AND BEST BID FOR THE CONSTRUCTION OF
PUBLIC IMPROVEMENTS AND QUESTIONNAIRE IN ACCORDANCE
WITH CANTON ORDINANCE 86/2009, CHAPTER 105.01**

NOTICE

All bidders shall hereby take notice of the factors to be considered by the Board of Control in determining whether a bid is not only the lowest bid, but the best bid. Said factors are contained in Canton Ordinance 86/2009, Chapter 105.01, a copy of which is included in these specifications.

QUESTIONNAIRE

When completing Bid Form #12, please submit your answers, separately, on your company letterhead and attach to Bid Form #12.

In accordance with Canton Ordinance 86/2009, Chapter 105.01, Section (c), each bidder must complete the following questionnaire. This questionnaire is to be completed in a truthful and responsible manner by the bidder. The City reserves the right to consider the bidder in default for any false or misleading information supplied per this questionnaire. If the bid is made by a corporation, then this questionnaire is to be completed by its properly authorized agent.

1. Please describe the work, supplies and materials covered by the bidder's bid.
2. Please state the identification of all work to be subcontracted. **All subcontractors are also subject to the approval of the Board of Control based on the criteria contained in this section.**
3. Please provide the descriptions of the bidder's experience with projects of comparative size, complexity and cost within recent years, demonstrating the bidder's ability and capacity to perform a substantial portion of the project with its own forces.
4. Please provide documentation from previous, similar projects regarding timeliness of performance, quality of work, extension requests, fines and penalties imposed and payments thereof, liens filed, explanations of the same.
5. Please state the number of years the bidder has been actively engaged as a contractor in the construction industry.

6. Please provide your recent experience record in the construction industry, including the original contract price for each construction job undertaken by the bidder, the amount of any change orders or cost overruns on each job, the reasons for the change orders or cost overruns, and the bidder's record for complying with and meeting completion deadlines on construction projects.
7. Please identify any project(s) within the previous five years that the bidder was determined by a public entity not to be a responsible bidder, the reasons given by the public entity, together with an explanation thereof.
8. Please identify your financial responsibility to assure that the bidder processes adequate resources and availability of credit, the means and ability to procure insurance and acceptable performance bonds required for the project and whether any claims have been made against performance bonds secured by the bidder on other construction projects.
9. Please describe any suspension or revocations of any professional license of any director, officer, owner, or managerial employees of the bidder, to the extent that any work to be performed is within the field of such licensed professional.
10. Please describe any and all OSHA violations within the previous three years, as well as all notices of OSHA citations filed against the bidder in the same three year period, together with an explanation of remediation or other steps taken regarding such violations and notices of violation.
11. Please describe any and all violations within the previous five years pertaining to unlawful intimidation or discrimination against any employee by reason race, creed, color, disability, gender or national origin and/or violations of an employee's civil or labor rights or equal employment opportunities.
12. Please describe any litigation (including copies of pleadings) in which the bidder has been named as a defendant or third party defendant in an action involving a claim for personal injury or wrongful death arising from performance of work related to any project in which it has been engaged within the previous five years.
13. Please describe any allegations of violations of the prevailing wage law and any other state or federal labor law, including, but not limited to, child labor violations, failure to pay wages, or unemployment insurance tax delinquencies or unfair practices within the past five years.
14. Please describe any violations of the worker compensation law.

15. Please describe any criminal convictions or criminal indictments, involving the bidder, its officers, directors, owners, and/or managers within the past five years.
16. Please describe any violation within the past five years or pending charges concerning federal, state, or municipal environmental and/or health laws, codes, rules and/or regulations.
17. Please provide documentation that the bidder provides health insurance and pension benefits to its employees.
18. Please state the experience and the continuity of the bidder's work force.
19. Please submit the identity of the bidder's permanent work force that will be employed on the public contract, to include the number of employees (or contract labor) to be assigned to the contract, their city and state of residence, and their job descriptions or trade specialties.
20. Please provide the identity of any temporary work force that will be employed on the public contract, to include the number of employees (or contract labor) to be assigned to the contract, their city and state of residence, and their job descriptions or trade specialties.
21. Please state whether the bidder's work force is drawn mainly from local employees. The number of local employees, as defined in paragraph (a)(3) of Ordinance 86/2009, and their job descriptions or trade specialties that the bidder will employ on the public contract.
22. If the bidder claims that non-local employees (or non-local contract labor) are to be assigned to the public contract instead of local employees, please state in detail the reasons therefore.
23. If the bidder claims that local employees are not intended to be used by the bidder on the public contract because they are not available, qualified or trainable within a reasonable period of time, please state in detail the reasons therefore.
24. State whether the bidder participates in a bona fide apprenticeship program that is approved by the Ohio State Apprenticeship Council and the United States Department of Labor.
25. State whether the bidder has adopted and implemented a comprehensive drug and alcohol testing program for its employees.
26. State whether the bidder's employees are OSHA-10 and/or OSHA-30 certified.

PERFORMANCE BOND AFFIDAVIT

Unless Bidder submits, with its bid, a Bid and Contract Bond per ORC. 153.571, Canton may request that the Bidder obtain, from its insurance representative, a performance bond affidavit that contains the representations noted below. The affidavit shall be made on the insurance agency's letterhead, reference this project by name and state at least the following:

- (1) The representative certifies that, should the contract be awarded to the contractor on whose behalf the certificate is being provided, the performance bond specified will be provided.
- (2) The name and A.M. Best Company ratings of companies which are expected to provide the required performance bond.

THE PERFORMANCE BOND AFFIDAVIT SHALL BE NOTARIZED.

AFFIDAVIT

Now comes _____, the duly
authorized representative of _____,
(name of company)

A bidder in City Project _____
(name of project)

And hereby desposes and states under oath that the _____
(name of bidder's company)

shall employ all local labor for all work to be performed on City Project in the event said
bidder is awarded the contract for said Project.

Authorized Signature of Company

Sworn to and subscribed before me this ____ day of _____, 20__.

Name of Notary Public

My Commission Expires:

CERTIFICATION

I, _____
(Name of person signing affidavit) (Title)

do hereby certify that _____ does not have an
(Company or Individual Name)

outstanding unresolved finding for recovery issued by the Auditor of the
State of Ohio as defined by Ohio Revised Code (ORC) Section 9.24 as of

(Current date)

Signature of Officer or Agent

Name (Print)

Sworn to and subscribed in my presence this ___ day of _____, 20 ___

(Notary Public)

GOVERNMENT BUSINESS AND FUNDING CONTRACTS
In accordance with section 2909.33 of the Ohio Revised Code

DECLARATION REGARDING MATERIAL ASSISTANCE/NONASSISTANCE TO A TERRORIST ORGANIZATION

This form serves as a declaration by an applicant for a government contract or funding of material assistance/nonassistance to an organization on the U.S. Department of State Terrorist Exclusion List ("TEL"). Please see the Ohio Homeland Security Division Web site for a copy of the TEL.

Any answer of "yes" to any question, or the failure to answer "no" to any question on this declaration shall serve as a disclosure that material assistance to an organization identified on the U.S. Department of State Terrorist Exclusion List has been provided. Failure to disclose the provision of material assistance to such an organization or knowingly making false statements regarding material assistance to such an organization is a felony of the fifth degree.

For the purposes of this declaration, "material support or resources" means currency, payment instruments, other financial securities, funds, transfer of funds, financial services, communications, lodging, training, safe houses, false documentation or identification, communications equipment, facilities, weapons, lethal substances, explosives, personnel, transportation, and other physical assets, except medicine or religious materials.

COMPLETE THIS SECTION ONLY IF YOU ARE AN INDEPENDENT CONTRACTOR

LAST NAME		FIRST NAME		MI
HOME ADDRESS				
CITY	STATE	ZIP	COUNTY	
HOME PHONE		WORK PHONE		

COMPLETE THIS SECTION ONLY IF YOU ARE A COMPANY, BUSINESS OR ORGANIZATION

BUSINESS/ORGANIZATION NAME			PHONE	
BUSINESS ADDRESS				
CITY	STATE	ZIP	COUNTY	
BUSINESS/ORGANIZATION REPRESENTATIVE NAME			TITLE	

DECLARATION

In accordance with section 2909.32 (A)(2)(b) of the Ohio Revised Code

For each question, indicate either "yes," or "no" in the space provided. Responses must be truthful to the best of your knowledge.

- | | | |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------|-----------------------------|
| 1. Are you a member of an organization on the U.S. Department of State Terrorist Exclusion List? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| 2. Have you used any position of prominence you have with any country to persuade others to support an organization on the U.S. Department of State Terrorist Exclusion List? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| 3. Have you knowingly solicited funds or other things of value for an organization on the U.S. Department of State Terrorist Exclusion List? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| 4. Have you solicited any individual for membership in an organization on the U.S. Department of State Terrorist Exclusion List? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| 5. Have you committed an act that you know, or reasonably should have known, affords "material support or resources" to an organization on the U.S. Department of State Terrorist Exclusion List? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| 6. Have you hired or compensated a person you knew to be a member of an organization on the U.S. Department of State Terrorist Exclusion List, or a person you knew to be engaged in planning, assisting, or carrying out an act of terrorism? | <input type="checkbox"/> Yes | <input type="checkbox"/> No |

If an applicant is prohibited from receiving a government contract or funding due to a positive indication on this form, the applicant may request the Ohio Department of Public Safety to review the prohibition. Please see the Ohio Homeland Security Web site for information on how to file a request for review.

CERTIFICATION

I hereby certify that the answers I have made to all of the questions on this declaration are true to the best of my knowledge. I understand that if this declaration is not completed in its entirety, it will not be processed and I will be automatically disqualified. I understand that I am responsible for the correctness of this declaration. I understand that failure to disclose the provision of material assistance to an organization identified on the U.S. Department of State Terrorist Exclusion List, or knowingly making false statements regarding material assistance to such an organization is a felony of the fifth degree. I understand that any answer of "yes" to any question, or the failure to answer "no" to any question on this declaration shall serve as a disclosure that material assistance to an organization identified on the U.S. Department of State Terrorist Exclusion List has been provided by myself or my organization. If I am signing this on behalf of a company, business or organization, I hereby acknowledge that I have the authority to make this certification on behalf of the company, business or organization referenced on page 1 of this declaration.

APPLICANT SIGNATURE X	DATE
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OHIO DEPARTMENT OF PUBLIC SAFETY
Division of Homeland Security

Terrorist Exclusion List

As of March 2009

U.S. Department of State List of Designated Foreign Terrorist Organizations

1. Abu Nidal Organization (ANO)
2. Abu Sayyaf Group
3. Al-Aqsa Martyrs Brigade
4. Ansar al-Islam
5. Armed Islamic Group (GIA)
6. Asbat al-Ansar
7. Aum Shinrikyo
8. Basque Fatherland and Liberty (ETA)
9. Communist Party of the Philippines/New People's Army (CPP/NPA)
10. Continuity Irish Republican Army
11. Gama'a al-Islamiyya (Islamic Group)
12. HAMAS (Islamic Resistance Movement)
13. Harakat ul-Mujahidin (HUM)
14. Hizballah (Party of God)
15. Islamic Jihad Group
16. Islamic Movement of Uzbekistan (IMU)
17. Jaish-e-Mohammed (JEM) (Army of Mohammed)
18. Jemaah Islamiya organization (JI)
19. al-Jihad (Egyptian Islamic Jihad)
20. Kahane Chai (Kach)
21. Kongra-Gel (KGK, formerly Kurdistan Workers' Party, PKK, KADEK)
22. Lashkar-e Tayyiba (LT) (Army of the Righteous)
23. Lashkar i Jhangvi
24. Liberation Tigers of Tamil Eelam (LTTE)
25. Libyan Islamic Fighting Group (LIFG)
26. Moroccan Islamic Combatant Group (GICM)
27. Mujahedin-e Khalq Organization (MEK)
28. National Liberation Army (ELN)
29. Palestine Liberation Front (PLF)
30. Palestinian Islamic Jihad (PIJ)
31. Popular Front for the Liberation of Palestine (PFLP)
32. PFLP-General Command (PFLP-GC)
33. al-Qa'ida
34. Real IRA
35. Revolutionary Armed Forces of Colombia (FARC)
36. Revolutionary Nuclei (formerly ELA)
37. Revolutionary Organization 17 November
38. Revolutionary People's Liberation Party/Front (DHKP/C)
39. Salafist Group for Call and Combat (GSPC)
40. Shining Path (Sendero Luminoso, SL)
41. Tanzim Qa'idat al-Jihad fi Bilad al-Rafidayn (QJBR) (al-Qaida in Iraq) (formerly Jama'at al-Tawhid wa'al-Jihad, JTJ, al-Zarqawi Network)
42. United Self-Defense Forces of Colombia (AUC)

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U.S. Department of State Terrorist Exclusion List

1. Afghan Support Committee (a.k.a. Ahya ul Turas; a.k.a. Jamiat Ayat-ur-Rhas al Islamia; a.k.a. Jamiat Ihya ul Turath al Islamia; a.k.a. Lajnat el Masa Eidatul Afghania)
2. Al Taqwa Trade, Property and Industry Company Ltd. (f.k.a. Al Taqwa Trade, Property and Industry; f.k.a. Al Taqwa Trade, Property and Industry Establishment; f.k.a. Himmat Establishment; a.k.a. Waldenberg, AG)
3. Al-Hamati Sweets Bakeries
4. Al-Ittihad al-Islami (AIAI)
5. Al-Manar
6. Al-Ma'unah
7. Al-Nur Honey Center
8. Al-Rashid Trust
9. Al-Shifa Honey Press for Industry and Commerce
10. Al-Wafa al-Igatha al-Islamia (a.k.a. Wafa Humanitarian Organization; a.k.a. Al Wafa; a.k.a. Al Wafa Organization)
11. Alex Boncayao Brigade (ABB)
12. Anarchist Faction for Overthrow
13. Army for the Liberation of Rwanda (ALIR) (a.k.a. Interahamwe, Former Armed Forces (EX-FAR))
14. Asbat al-Ansar
15. Babbar Khalsa International
16. Bank Al Taqwa Ltd. (a.k.a. Al Taqwa Bank; a.k.a. Bank Al Taqwa)
17. Black Star
18. Communist Party of Nepal (Maoist) (a.k.a. CPN(M); a.k.a. the United Revolutionary People's Council, a.k.a. the People's Liberation Army of Nepal)
19. Continuity Irish Republican Army (CIRA) (a.k.a. Continuity Army Council)
20. Darkazanli Company
21. Dhamat Houmet Daawa Salafia (a.k.a. Group Protectors of Salafist Preaching; a.k.a. Houmat Ed Daawa Es Salafiya; a.k.a. Katibat El Ahoual; a.k.a. Protectors of the Salafist Predication; a.k.a. El-Ahoual Battalion; a.k.a. Katibat El Ahouel; a.k.a. Houmate Ed-Daawa Es-Salafia; a.k.a. the Horror Squadron; a.k.a. Djamaat Houmat Eddawa Essalafia; a.k.a. Djamaatt Houmat Ed Daawa Es Salafiya; a.k.a. Salafist Call Protectors; a.k.a. Djamaat Houmat Ed Daawa Es Salafiya; a.k.a. Houmate el Da'awaa es-Salafiyya; a.k.a. Protectors of the Salafist Call; a.k.a. Houmat ed-Daaoua es-Salafia; a.k.a. Group of Supporters of the Salafiste Trend; a.k.a. Group of Supporters of the Salafist Trend)
22. Eastern Turkistan Islamic Movement (a.k.a. Eastern Turkistan Islamic Party; a.k.a. ETIM; a.k.a. ETIP)
23. First of October Antifascist Resistance Group (GRAPO) (a.k.a. Grupo de Resistencia Anti-Fascista Premero De Octubre)
24. Harakat ul Jihad i Islami (HUJI)
25. International Sikh Youth Federation
26. Islamic Army of Aden
27. Islamic Renewal and Reform Organization
28. Jamiat al-Ta'awun al-Islamiyya
29. Jamiat ul-Mujahideen (JUM)
30. Japanese Red Army (JRA)
31. Jaysh-e-Mohammed
32. Jayshullah
33. Jerusalem Warriors
34. Lashkar-e-Tayyiba (LET) (a.k.a. Army of the Righteous)
35. Libyan Islamic Fighting Group

36. Loyalist Volunteer Force (LVF)
37. Makhtab al-Khidmat
38. Moroccan Islamic Combatant Group (a.k.a. GICM; a.k.a. Groupe Islamique Combattant Marocain)

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39. Nada Management Organization (f.k.a. Al Taqwa Management Organization SA)
40. New People's Army (NPA)
41. Orange Volunteers (OV)
42. People Against Gangsterism and Drugs (PAGAD)
43. Red Brigades-Combatant Communist Party (BR-PCC)
44. Red Hand Defenders (RHD)
45. Revival of Islamic Heritage Society (Pakistan and Afghanistan offices -- Kuwait office not designated) (a.k.a. Jamia Ihya ul Turath; a.k.a. Jamiat Ihia Al- Turath Al-Islamiya; a.k.a. Revival of Islamic Society Heritage on the African Continent)
46. Revolutionary Proletarian Nucleus
47. Revolutionary United Front (RUF)
48. Salafist Group for Call and Combat (GSPC)
49. The Allied Democratic Forces (ADF)
50. The Islamic International Brigade (a.k.a. International Battalion, a.k.a. Islamic Peacekeeping International Brigade, a.k.a. Peacekeeping Battalion, a.k.a. The International Brigade, a.k.a. The Islamic Peacekeeping Army, a.k.a. The Islamic Peacekeeping Brigade)
51. The Lord's Resistance Army (LRA)
52. The Pentagon Gang
53. The Riyadus-Salikhin Reconnaissance and Sabotage Battalion of Chechen Martyrs (a.k.a. Riyadus-Salikhin Reconnaissance and Sabotage Battalion, a.k.a. Riyadh-as-Saliheen, a.k.a. the Sabotage and Military Surveillance Group of the Riyadh al-Salihin Martyrs, a.k.a. Riyadus Salikhin Reconnaissance and Sabotage Battalion of Shahids (Martyrs))
54. The Special Purpose Islamic Regiment (a.k.a. the Islamic Special Purpose Regiment, a.k.a. the al-Jihad-Fisi-Sabilillah Special Islamic Regiment, a.k.a. Islamic Regiment of Special Meaning)
55. Tunisian Combat Group (a.k.a. GCT, a.k.a. Groupe Combattant Tunisien, a.k.a. Jama'a Combattante Tunisien, a.k.a. JCT; a.k.a. Tunisian Combatant Group)
56. Turkish Hizballah
57. Ulster Defense Association (a.k.a. Ulster Freedom Fighters)
58. Ummah Tameer E-Nau (UTN) (a.k.a. Foundation for Construction; a.k.a. Nation Building; a.k.a. Reconstruction Foundation; a.k.a. Reconstruction of the Islamic Community; a.k.a. Reconstruction of the Muslim Ummah; a.k.a. Ummah Tameer I-Nau; a.k.a. Ummah Tameer E-Nau; a.k.a. Ummah Tameer-I-Pau)
59. Youssef M. Nada & Co. Gesellschaft M.B.H.

**U.S. Treasury Department's Designated Charities and Potential Fundraising
Front Organizations for FTOs**

1. Makhtab al-Khidamat / Al Kifah (formerly U.S.-based, Pakistan)
2. Al Rashid Trust (Pakistan)
3. Wafa Humanitarian Organization (Pakistan, Saudi Arabia, Kuwait, United Arab Emirates)
4. Rabita Trust (Pakistan)
5. Ummah Tameer E-Nau (Pakistan)
6. Revival of Islamic Heritage Society - Pakistan and Afghanistan Branches (Kuwait, Afghanistan, Pakistan)
7. Afghan Support Committee (Afghanistan, Pakistan)
8. Al Haramain Foundation (Indonesia, Kenya, Pakistan, Tanzania, Bosnia, Somalia,

Bangladesh, Afghanistan, Albania, Ethiopia, Netherlands, Comoros Islands, and United States branches)

9. Aid Organization of the Ulema (Pakistan)

10. Global Relief Foundation (United States)

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11. Benevolence International Foundation (United States):
12. Benevolence International Fund (Canada)
13. Bosanska Idealna Futura (Bosnia)
14. Stichting Benevolence International Nederland (Netherlands)
15. Lajnat al Daawa al Islamiyya (Kuwait, Pakistan, Afghanistan)
16. Al Akhtar Trust (Pakistan)
17. Taibah International (Bosnia)
18. Al Haramain & Al Masjed Al Aqsa Charity Foundation (Bosnia)
19. Al Furqan (Bosnia)
20. Islamic African Relief Agency (IARA) / Islamic Relief Agency (ISRA) (Sudan, United States and 40 other branches throughout the world)
21. The Holy Land Foundation for Relief and Development (United States)
22. Al Aqsa Foundation (United States, Europe, Pakistan, Yemen, South Africa)
23. Comité de Bienfaisance et de Secours aux Palestiniens (France)
24. Association de Secours Palestinien (Switzerland)
25. Interpal (Palestinian Relief & Development Fund) (United Kingdom)
26. Palestinian Association in Austria (Austria)
27. Sanibil Association for Relief and Development (Lebanon)
28. Elehssan Society (Palestinian territories)
29. Aleph (Aum Shinrikyo/Aum Supreme Truth)
30. Rabbi Meir David Kahane Memorial Fund (Kahane Chai and Kach)
American Friends of the United Yeshiva (Kahane Chai and Kach)
American Friends of Yeshivat Rav Meir (Kahane Chai and Kach)
Friends of the Jewish Idea Yeshiva (Kahane Chai and Kach)
31. Irish Republican Prisoners Welfare Association (Real IRA)
32. Socorro Popular Del Peru/People's Aid of Peru (Sendero Luminoso/Shining Path)

APPENDIX

C

CHANGE ORDER POLICY

Canton Engineering Change Order Policy

The need for a Change Order for work or materials not included in the scope of the contract or exceeding plan quantities may occur at any time during the contract. The LPA Construction Manager or the LPA Contractor may initiate the Change Order process. The LPA Project Inspector will document the date that the change is first encountered. The LPA Construction Manger will determine if a change in the contract is needed. (Note: LPA Project Inspector may be a Consultant Construction Contract Administrator or the Canton Project Inspector assigned to the project.) The project record shall include record of all changes.

Change Orders will be categorized into the following Tiers:

Tier 1:

A quantity adjustment for projects less than \$500,000.00 cannot exceed \$25,000.00 to qualify as a Tier 1 Change Order. A quantity adjustment for projects greater than \$500,000.00 cannot exceed the lesser of 5% or \$100,000.00 to qualify as a Tier 1 Change Order. The change of the quantities will be adjusted on a Change Order that will address these changes after an accumulation of adjustments for the project is received. Requests for adjustment may occur at any time before the final payment is made.

Tier 2:

Changes that cannot be addressed using contract unit prices, exceed the Tier 1 limits, extend the contract limits, or change the environmental impact will be presented formally on a Change Order. Contractor shall submit an estimated cost and scope of the work to be performed to the LPA Project Manager. The LPA Project Manager will assemble the documentation, including purpose and analysis of the cost of the proposed change for submission to the LPA Construction Manager. LPA Construction Manager shall review the submitted documentation for availability of funds, acceptability of costs and need for the said changes. Further, the LPA Construction Manager will secure concurrence from ODOT Construction Monitor and make recommendation to the Canton City Engineer for acceptance.

The Change Order will then be recommended to the Board of Control for approval. If the sum of all Change Orders exceeds the lesser of \$100,000.00 or 10% of the total of the original contract cost, the Change Order will be presented to the Canton City Council for approval before being submitted to the Board of Control.

Execution of the work will not be performed until authorization is given to the contractor from the LPA. In the event that an agreed price cannot be negotiated, LPA will adhere to force account procedures.

Authorization of Change Order Work:

Tier 1:

The Canton City Engineering will authorize the work prior to submission of the Change Order. Contractor cannot proceed until such authorization.

Tier 2:

The contractor must receive written authorization, from the Canton City Engineer, before the execution of any of the Change Order work. This authorization will not be given until the Change Order has been approved by the Board of Control, Canton City Council, and ODOT, as needed. The Canton City Engineer may override Tier 2 Authorization procedure for any circumstances to assure safety, environment, or protection of property.

NOTE: Canton City Council must approve all Change Orders prior to authorization for both Tier 1 and Tier 2 should the individual or aggregate cost of all Change Orders exceed the lesser of 100,000.00 or 10% of the project original cost.

APPENDIX

D

CLAIMS MANAGEMENT POLICY

City of Canton Engineering Department's Claims Management Policy

The City of Canton recognizes the need to contend with claims experienced by the contractor that are not addressed by the contract. This policy acts as directive to provide stability and expertise in the management of its claims and to ensure they are investigated, evaluated, and resolved in a timely and professional manner.

Claims

A dispute is not identified as a claim until a *Notice of Intent to File a Claim*. The *Notice of Intent to File a Claim* cannot be made until Steps 1 and 2 are completed. A claim is defined as formal assertion by the contractor for something due or believed to be due to the contractor. This claim may include monetary compensation and/or time extension for the completion of the contract. All claims must be presented by the Prime Contractor. Claims submitted by a sub-contractor or supplier against the City or Prime Contractor shall not be accepted.

Purpose

This policy attempts to resolve disputes in a fair and cost-effective manner. The documentation resulting from this procedure will provide information needed to make a reasonable and unbiased decision. City of Canton Engineering acknowledges that costs can be kept to a minimum when the resolution is found at the departmental level.

Process

The Contractor must follow this policy to be eligible for any compensation (time or monetary) for any and all claims not covered by the Change Order Policy. All steps in the policy must be completed prior to moving to the next step. The Contractor shall continue with all Work, including that which is in dispute. The City will continue to pay for work being performed.

Prior to entering into the formal claim resolution process, both the contractor superintendent and the City's Inspector and Construction Manager agree to attempt to resolve any disputes in a good faith effort that is fair and equitable to both the contractor and the City within the guidelines and requirements established by the contract. If this good faith effort does not resolve the problem, the contractor may proceed into the Claims Management Procedure.

Step 1 City Project Manager

The City Project Manager shall meet with the Contractor's superintendent and City Construction Inspector within two (2) working days of receipt of the Contractor Written Early Notice set forth in 104.02.G of the ODOT Construction and Material Specifications. The City Project Manager will negotiate in an effort to reach a resolution according to the Contract Documents. The City Project Manager will issue a written decision of Step 1 within fourteen (14) calendar days of the meeting. If the dispute is not resolved, the Contractor must either abandon or escalate the dispute to Step 2. The claim along with all pertinent information and contract provisions shall be presented to the City Project Manager by the contractor and City representatives.

Step 2 City Engineer

Within seven (7) calendar days of receipt of the Step 1 decision, the Contractor must submit a

written request for a Step 2 meeting to the City Engineer. The City Engineer will assign the dispute a dispute number. Within fourteen (14) calendar days of receipt of the request for a Step 2 meeting, the Contractor shall submit the Dispute Documentation as follows:

1. The Contractor shall submit three (3) complete copies of the documentation of the dispute to the City Engineer.
2. The Dispute Documentation shall be identified on a cover page by G.P.# (project number), Contractor name, subcontractor or supplier if involved in the dispute, and dispute number.
3. The Dispute Documentation shall be an original document that clearly and in detail gives the required information for each item of additional compensation and time extension requested.
4. A narrative of the disputed work or project circumstance at issue. This section must include the dates of the disputed work and the date of early notice.
5. References to the applicable provisions of the plans, specifications, proposal, or other contract documents. Copies of the cited provisions shall be included in the Dispute Documentation.
6. The dollar amount of additional compensation and length of contract time extension being requested.
7. The cost and supporting documents that served as the basis for the requested compensation stated in number six (6) above.
8. A detailed schedule analysis must be included in the Dispute Documentation for any dispute concerning additional contract time, actual or constructive acceleration, or delay damages. At a minimum, the schedule analysis must include the Schedule Update immediately preceding the occurrence of the circumstance alleged to have caused delay and must comply with accepted industry practices. Failure to submit the required schedule analysis will result in the denial of that portion of the Contractor's request.
9. Copies of relevant correspondence and other pertinent documents.

The City Engineer shall review and recommend a resolution to the claim. If recommended by the City Engineer, the process will cease and the claim will be processed as a Change Order. Otherwise, the City Engineer will meet with the contractor's representative, the City Project and Construction Managers within fourteen (14) days to hear each party's stance and as a last chance opportunity to resolve the claim before escalating to Step 3. The City Engineer will issue a written determination of Step 2 to the contractor and project file within fourteen (14) days. If the dispute is not resolved, the Contractor must either abandon or escalate the dispute to Step 3.

Step 3 Canton Service Director

Within fourteen (14) calendar days of receipt of the Step 2 decision, the Contractor must submit a written *Notice of Intent to File a Claim* to the Canton City Service Director. This notice shall state the Contractor's request for a Canton Service Director hearing on the claim. The dispute becomes a claim when the Service Director receives the *Notice of Intent to File a Claim*. The City of Canton Law and Purchasing Departments will provide advice to the Canton Service Director. The Canton Service Director will be responsible for deciding claims.

The Contractor shall submit six (6) complete copies of its Claim Documentation to the City Engineer within thirty (30) calendar days of receipt of the *Notice of Intent to File a Claim*. This time frame may be extended upon mutual agreement of the parties and with approval of the Committee. In addition to the documentation submitted at Step 2, the narrative shall be enhanced to include sufficient description and information to enable understanding by a third party who has no knowledge of the dispute or familiarity with the project. This documentation must also include a discussion of the efforts taken to resolve the dispute. When submitting the Claim Documentation, the Contractor must certify the claim in writing. Such certification shall attest to the following:

1. The claim is made in good faith.
2. To the best of the Contractor's knowledge, all data offered to support the claim is accurate and complete.
3. The claim amount accurately reflects the Contractor's actual incurred costs and additional time impacts.

This claim certification shall also be notarized pursuant to the laws of the State of Ohio. The following is an example of the correct form for a claim certification:

(The Contractor) certifies that this claim is made in good faith, that all supporting data is accurate and complete to the best of (the Contractor's) knowledge and belief, and that the claim amount accurately reflects the contract amendment for which (the Contractor) believes the City of Canton is liable.

By: _____

(The Contractor, Name and Title)

Date of Execution: _____

Within thirty (30) calendar days of receipt of the Contractor's Claim Documentation, the City Engineer shall submit six (6) complete copies of its Claim Documentation to the Canton Service Director. In the event that the Contractor is granted a time extension for the submission of its Claim Documentation, the City Engineer will be granted an equal time extension for submission of its Claim Documentation. At a minimum, the City Engineer's Claim Documentation must include:

1. A narrative of the disputed work or project circumstance at issue with sufficient description and information to enable understanding by a third party who has no knowledge of the dispute or familiarity with the project. This section must include the

dates of the disputed work and the date of early notice. The narrative must also discuss the prior efforts taken to resolve the dispute.

2. References to the applicable provisions of the plans, specifications, proposal, or other contract documents. Copies of the cited provisions shall be included in the claim document.
3. Response to each argument set forth by the Contractor.
4. Any counter-claims, accompanied by supporting documentation, the Canton Service Director Claims Committee wishes to assert.
5. Copies of relevant correspondence and other pertinent documents.

Within fourteen (14) calendar days of receipt of the Construction Manager's Claim Documentation, the City Engineer will forward one (1) complete copy to the Contractor and will schedule a hearing on the dispute. Once a hearing date has been established, both the Contractor and Construction Manager shall provide the Canton City Engineer with the list of names and telephone numbers of each person who may present information at the hearing. Reasonable time, generally not to exceed 60 days, will be provided for submission and review of additional documentation by either party prior to the hearing date. However, unless otherwise permitted by the Committee, the exchange of documentation and all disclosures specified in this step of the process shall be completed at least fourteen (14) calendar days prior to the hearing. Upon request or at the Committee's discretion, the Committee may delay the hearing one (1) time to allow more time for review and requests for more documentation. In the event of multiple claims, the Committee may order that they be considered in a single hearing. The Committee may hold this hearing after the completion of the project or until such time that it is assured that all disputes on the project have been processed through Steps 1 and 2. The Contractor and Construction Manager will each be allowed adequate time to present their respective positions before the Committee. The Contractor and Construction Manager will also each be allowed adequate time for one (1) rebuttal limited to the scope of the opposing party's presentation. The Contractor's position will be presented by a Contractor's representative who is thoroughly knowledgeable of the claim. Similarly, the Construction Manager's position will be presented by the Construction Manager or a representative who is thoroughly knowledgeable of the claim. Each party may have others assist in the presentation. The Committee may, on its own initiative, request information of the Contractor in addition to that submitted for the hearing. If the Contractor fails to reasonably comply with such request, the Committee may render its decision without such information. Upon completion of the hearing and consideration of any additional information submitted upon request, the Committee will submit a written recommendation on the disposition of the claim to the Canton Service Director. The Canton Service Director will ratify, modify, or reject the recommendation of the Committee and render its decision within sixty (60) calendar days of the hearing. Within thirty (30) calendar days of receipt of the Committee's decision, the Contractor must either accept or reject the decision in writing. In the event the Contractor fails to do so, the Committee may revoke any offers of settlement contained in the decision. The decision of the Committee is the final step of Canton Engineering Department Dispute Resolution Process and may not be appealed within the Department. The Committee is not bound by any offers of settlement or findings of entitlement made during Steps 1 and 2 of the Dispute Resolution Process.

APPENDIX

E

Project Labor Agreement

**PROJECT LABOR AGREEMENT
FOR THE
TRINITY PLACE AND CAPRICE AVENUE NW
SANITARY MANHOLE REHABILITATION PROJECT**

(G.P. 1174)

ENTERED INTO BETWEEN

CITY OF CANTON

AND

EAST CENTRAL OHIO BUILDING AND CONSTRUCTION

TRADES COUNCIL AFL-CIO

AND

SIGNATORY LOCAL UNIONS

Effective _____

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ARTICLE I

INTENT AND DURATION

Section 1. Intent And Duration. This Project Labor Agreement (the "Agreement") is entered into between the City of Canton (collectively the "Owner"); the East Central Ohio Building and Construction Trades Council, AFL-CIO ("ECOB & CTC" or "Council"); and the Signatory Unions (the "Unions"), and applies exclusively to the construction, renovation, replacement and installation work within the scope of this Agreement to be performed on the Trinity Place and Caprice Avenue NW Sanitary Manhole Rehabilitation Project (G.P. 1174) (the "Project"). The purpose of this Agreement is to promote efficiency in the construction of the improvements and/or renovation involving the Project and to provide for the peaceful settlement of any and all labor disputes and grievances without strikes or lockouts, thereby promoting the public interest in assuring the timely and economical completion of the Project. This Agreement shall expire and be of no further force or effect upon the completion of the Project.

Upon execution of this Agreement by all parties, all construction, remodeling and renovation work covered by this Agreement on the Project shall be contracted exclusively to Contractors, of whatever tier, who agree to execute and be bound by the terms of this Agreement. The Unions agree that Contractors may execute the Agreement, or the Letter of Assent attached as Appendix I, for purposes of performing such work. The Owner (or its permitted designee) shall monitor compliance with this Agreement by all contractors and subcontractors. For purposes of the Agreement, the term "Contractor" shall be deemed to include all construction contractors and subcontractors of whatever tier engaged in on-site construction and renovation work on the Project. The Owner, the Unions and all signatory Contractors agree to abide by the terms and conditions contained in the Agreement. This Agreement represents the complete understanding of all parties, and no Contractor is or will be required to sign any other agreement with a signatory union as a condition of performing work coming within the scope of this Agreement. No practice, understanding or agreement between a Contractor and a Union, which conflicts with any provisions in this Agreement, will be binding on any other party unless endorsed in writing by the Owner.

Section 2. Limitation Of Agreement To Project. The Unions agree that this

Agreement will be made available to, and will fully apply to, any successful bidder for work on the Project, without regard to whether that successful bidder performs work at other sites on either a union or a non-union basis, and without regard to whether employees of such bidder are or are not members of any union. The Unions further agree that this Agreement applies only to this Project. Nothing in this agreement is intended to, or shall, interfere with, or negate, any existing contractual relationship or collective bargaining agreement between the Union and any contractor or subcontractor that may execute this Agreement.

ARTICLE II

PURPOSE

Section 1. Purpose. The parties to this Agreement understand and acknowledge the fact that the timely replacement and renovation of the City's sanitary sewer system under the Project is critical to the safety and health of the residents of the City of Canton and to users of Canton water, as well as to the economic development of the City of Canton. The parties signatory to this Agreement accordingly pledge their complete good faith and trust to work towards an on-time completion of the Project.

Section 2. Time Is Of The Essence. The parties to this Agreement understand and agree that time is of the essence for this Project. The parties understand and agree that the Owner has a critical need for timely completion of the Project and that timely completion of the Project is therefore vital. The parties understand and agree that timely completion of the Project will require the use of substantial numbers of employees from construction and supporting crafts possessing skills and qualifications that are essential to the Project. The Unions pledge that they have members who are competent, skilled, and qualified to perform the required construction work. The parties also understand that on-budget completion of the Project is most critical; it is therefore essential that construction work on the Project be done in an efficient, economical manner with optimum productivity and with no delays. In recognition of those special needs of the Project, the Unions signatory hereto and their members agree not to initiate, authorize, sanction, participate in or condone, or permit their members to engage in, any strike, sympathy strike, jurisdictional strike, recognitional strike, slowdown, sabotage, work to rule, sickout, sit down, picketing of any type (including informational picketing), handbilling, boycott, interruption of work or any

disruptive activity that interferes with or interrupts in any way work on the Project or other operations of the City of Canton. Contractors agree not to engage in any lockouts.

ARTICLE III

BENEFITS OF THE AGREEMENT

Section 1. Benefits Of The Agreement. This Agreement is intended to foster the achievement of a timely and on-budget completion of the Project by, among other things:

- (a) reducing and/or eliminating the tension and potential disagreements that might otherwise exist between Union and non-union workers on the Project;
- (b) avoiding the costly delays of strikes, sympathy strikes, jurisdictional strikes, slowdowns, walkouts, picketing, handbilling and any other disruptions or interference with work, and promoting labor harmony and peace for the duration of the Project;
- (c) standardizing terms and conditions governing the employment of labor on the Project;
- (d) permitting flexibility in work scheduling and shift hours and times;
- (e) achieving negotiated adjustments as to work rules and staffing requirements from those which otherwise might obtain;
- (f) providing comprehensive and standardized mechanisms for the settlement of work disputes;
- (g) ensuring a reliable source of skilled and experienced labor; and
- (h) furthering public policy objectives, to the extent lawful, as to improved employment opportunities for minorities, women and the economically disadvantaged in the construction industry in Stark County. Mindful of the economic condition and unemployment rate in Stark County, the Owner anticipates and expects that all construction workers and employees on this Project will be residents of Stark County. In view of the very technical and specialized work that is inherent in the construction industry, all parties acknowledge that this expectation by the Owner is a goal, not a mandate. To this end, all Contractors working under this Agreement pledge that they will make a good-faith effort to reach this goal expressed by the Owner.

ARTICLE IV

SCOPE OF AGREEMENT

Section 1. The Work. This Agreement is specifically defined and limited to onsite construction, renovation, replacement and installation of water meters, and related work, as required under the Project.

Section 2. Exclusions From Scope. Items specifically excluded from the scope of this Agreement, even if performed in connection with the Project, include the following:

- (a) Work of non-manual employees, including but not limited to, superintendents, supervisors, staff engineers, inspectors, quality control and quality assurance personnel, timekeepers, mail carriers, clerks, office workers, including messengers, guards, safety personnel, emergency medical and first aid technicians, and other professional, engineering, administrative, supervisory and management employees.
- (b) Equipment and machinery owned or controlled and operated by the Owner.
- (c) All off-site manufacture, fabrication or handling of materials, equipment or machinery (except at dedicated lay-down or storage areas and except as provided in Article IV, Section 10), and all deliveries of any type to and from the Project site.
- (d) All employees of the Owner, the Construction Supervisor, design team or any environmental, engineering or other consultant when such employees do not perform labor coming within the scope of this Agreement.
- (e) Any work performed on or near or leading to or onto the site of work on the Project and undertaken by state, county, city or other governmental bodies, or their contractors; or by public utilities or their contractors.
- (f) Off-site maintenance of leased equipment and on-site supervision of all such maintenance work.
- (g) Work by employees of a manufacturer or vendor necessary to maintain such manufacturer's or vendor's warranty or guarantee, or work performed by supervisors or technicians employed by the manufacturer

or vendor to oversee the testing of equipment once installed to insure that the equipment is fully operational.

- (h) Laboratory work for specialty testing or inspections not ordinarily done by the signatory local unions.
- (i) All work done by employees of any State agency, authority or entity or employees of any municipality or other public employer.

The Unions agree that there shall be no interference with or disruption of work, of those contractors, employers, and employees exempted from coverage of this Agreement by subparagraph (a) through (i) above.

Section 3. Contract Award and Consent to Agreement.

- (a) The Owner, and/or Contractors, as appropriate, have the absolute right to award contracts or subcontracts on the Project notwithstanding the existence or nonexistence of any agreements between such Contractor and any Union party provided only that such Contractor is willing, ready and able to execute and comply with this Agreement or a Letter of Assent thereto, should such Contractor be awarded work covered by this Agreement.
- (b) All subcontractors of a Contractor, of whatever tier, who have been awarded contracts of work covered by this Agreement, on or after the effective date of this Agreement, shall also be required to accept and to be bound by the terms and conditions of this Agreement, and shall evidence their acceptance by the execution of this Agreement or a Letter of Assent thereto, prior to the commencement of work. A copy of this Agreement or Letter of Assent executed by each Contractor shall be immediately provided to the Union upon execution.

Section 4. Stand-Alone Agreement. This Agreement is a stand-alone Agreement. While this Agreement expressly does not incorporate any local area collective bargaining agreements, such local area collective bargaining agreements may be referenced for the limited purposes as hereinafter set forth in this Agreement. However, to the extent, if any, that any provisions of this Agreement conflict with any provision of a local area collective bargaining agreement, the provisions of this Agreement shall control, except for all work performed under the NTL Articles of

Agreement, the National Stack/Chimney Agreement, the National Cooling Tower Agreement, all instrument calibration work and loop checking shall be performed under the terms of the UA/IBEW Joint National Agreement for Instrument and Control Systems Technicians, and the National Agreement of the International Union of Elevator Constructors, with the exception of Articles VII, VIII and X of this Agreement, which shall apply to such work.

Section 5. Craft Jurisdiction. This Agreement shall recognize the traditional craft jurisdictions of the signatory unions. Any and all jurisdictional disputes shall be settled in accordance with Article VIII below. While this Agreement is a stand-alone Agreement, the Agreement will utilize the local area collective bargaining agreements of signatory locals as a reference to define the signatory local unions' craft jurisdiction. Again, jurisdictional disputes shall be settled in accordance with Article VIII.

Section 6. Subcontracting. The Owner agrees that neither it nor any of its contractors or subcontractors will subcontract any work covered by this Agreement to be done on the Project except to a person, firm or corporation who is or agrees to become party to this Agreement. Any contractor or subcontractor working on the Project shall, as a condition to working on said Project, become signatory to and perform all work under the terms of this Agreement. Contractors who are signatory to local collective bargaining agreements shall be bound by the terms of their respective local collective bargaining agreements on subcontracting to the extent such terms are consistent with Article IV, Section 2 of this Agreement. Disputes concerning compliance with such local subcontracting provisions for this Project shall be subject to all of the dispute resolution provisions of this Agreement.

Section 7. Security. All employees covered by this Agreement in the employ of the Contractors shall remain members in the applicable signatory Union during the term of this Agreement, and all workers hereinafter employed by the Contractors shall become members of the applicable signatory Union seven (7) days after the date of their employment and shall remain members of the Union during the term of this Agreement. (This clause shall be applied to the extent permitted by law). A Contractor shall not discharge any employee for non-membership in the Union if: (a) he has reasonable grounds for believing that such membership was not available to the employee on the same terms and conditions generally applicable to other

members, or (b) he has reasonable grounds for believing that membership was denied or terminated for reasons other than the failure of the employee to tender the periodic dues and initiation fee uniformly required as a condition of acquiring or retaining membership.

Section 8. Liability. It is understood that the liability of the Contractor and the liability of the separate Unions under this Agreement shall be several and not joint. The Unions agree that this Agreement does not have the effect of creating any joint employer status between or among the Owner, Construction Supervisor and/or any Contractor, and neither the Owner nor Construction Supervisor shall assume any liabilities of the Contractors.

Section 9. Abatement of Agreement. As areas of covered work on the Project are accepted by the Owner, this Agreement shall have no further force or effect on such areas except where the Contractor is directed by the Owner to engage in repairs or punch list modifications.

Section 10. Miscellaneous. Notwithstanding any other provision of this Agreement, this Agreement applies and is limited to the recognized and accepted historical definition of demolition and any construction, replacement or installation work under the direction of and performed by the contractor(s), of whatever tier who have contracts awarded for such work on the project. Such work shall include dedicated off-site work except for the contractors and subcontractors specifically excluded in the agreement. Any off-site prefabrication of any building materials, systems and/or components traditionally performed on site shall be performed by the appropriate craft signatory to this agreement and approved by the owner.

ARTICLE V

LABOR/MANAGEMENT COOPERATION

JOINT ADMINISTRATIVE COMMITTEE

Section 1. The parties to this Agreement shall establish a Project Joint Administrative Committee ("Committee"). This Committee will be a two-person committee comprised of one member each appointed by the Owner (or its designee) and the Unions, with an alternate appointee Union member available to replace the regular appointee when a problem or grievance concerns the regular appointee's Union. Each member of the Committee shall designate an alternate who shall serve in the absence of

the member for any purpose contemplated by this Agreement.

Section 2. The Committee shall meet at least quarterly, or more often if special circumstances warrant, to discuss the administration of the Agreement, the progress of the Project, labor/management problems that may arise, and any other relevant matters. Any need for interpretation which might arise from the application of the terms and conditions of the Agreement shall be referred directly to the Committee for resolution.

ARTICLE VI

UNION RECOGNITION AND EMPLOYMENT

Section 1. Pre-Hire Recognition. Each Contractor and subcontractor recognizes the Unions as the sole and exclusive bargaining representatives of all craft and trade employees within their respective jurisdictions working on the Project under the Agreement.

Section 2. Contractor's Right of Selection. Each Contractor shall have the right to determine the competency of all employees, the number of employees required and shall have the sole responsibility for selecting employees to be laid off. To the extent any training or vendor education is required to fill any position, said training shall be undertaken at no cost or expense to Owner.

Section 3. Union Referral. For local Unions having a job referral system, each Contractor agrees to comply with such system, and the referral system shall be used exclusively by such Contractor, except as modified by this Article. Such job referral system will be operated in a non-discriminatory manner and in full compliance with Federal, state, and local laws and regulations requiring equal employment opportunities and nondiscrimination, and referrals shall not be affected in any way by the rules, regulations, bylaws, constitutional provisions or any other aspects or obligations of union membership, policies or requirements. The Union shall indemnify and hold each Contractor harmless with respect to any claim arising out of how the Union operates and administers its referral system. All hiring procedures, including related practices affecting apprenticeship and training, will be operated so as to facilitate the ability of the contractors to meet any and all equal employment opportunity/affirmative action obligations. The Contractor may reject any referral and request another, different referral; provided, however, the Contractor shall furnish,

upon request from the Union, a written explanation for the rejection.

Section 4. Lack of Job Referral System. In the event that a signatory Local Union does not have a job referral system as set forth in Section 3 above, the Contractor shall give the Union a forty-eight (48) hour opportunity to refer applicants. The Contractor shall notify the Union of employees hired from any source other than referral by the Union.

Section 5. Unavailability of Union Referrals. In the event that local Unions are unable to fill any requisitions for qualified employees within forty-eight hours (48) after such requisition is made by the Contractor (Saturdays, Sundays, and Holidays excepted), the Contractor may employ applicants from any other available source. The Contractor shall inform the Union of the name, address and telephone number of any applicants hired from other sources and refer the applicant for the Local Union for dispatch to the Project.

Section 6. Union Best Efforts. The Local Unions will exert their utmost efforts to recruit sufficient numbers of skilled craft workers to fulfill the manpower requirements of each Contractor, including calls to local unions in other geographic areas when its referral lists have been exhausted. The parties to this Agreement support the development of increased numbers of skilled construction workers from the residents of the area of the Project. Toward that end, the Unions agree to encourage the referral and utilization, to the extent permitted by law and the hiring hall procedures, of qualified residents as journeymen, apprentices and trainees on the Project.

ARTICLE VII

GRIEVANCE ARBITRATION PROCEDURE

Section 1. This Agreement is intended to provide close cooperation between management and labor. Each of the Unions will assign a representative to this Project for the purpose of completing the construction of the Project economically, efficiently, continuously, and without interruptions, delays, or work stoppages.

Section 2. The Contractors, Unions, and the employees, collectively and individually, realize the importance to all parties to maintain continuous and uninterrupted performance of the work of the Project, and agree to resolve disputes in accordance with the grievance-arbitration provisions set forth in this Article.

Section 3. Any question or dispute arising out of and during the term of this

Agreement (other than trade jurisdictional disputes) shall be considered a grievance and subject to resolution under the following procedures:

Step 1. (a) When any employee subject to the provisions of this Agreement feels he or she is aggrieved by a violation of this Agreement, he or she, through his or her local union business representative or job steward, shall, within five (5) working days after the occurrence of the violation, give notice to the work-site representative of the involved Contractor stating the provision(s) alleged to have been violated. The business representative of the local union or the job steward and the work-site representative of the involved Contractor shall meet and endeavor to adjust the matter within three (3) working days after timely notice has been given. The representative of the Contractor shall keep the meeting minutes and shall respond to the Union representative in writing at the conclusion of the meeting but not later than twenty-four (24) hours thereafter. If they fail to resolve the matter within the prescribed period, the Local Union may, within forty-eight (48) hours thereafter, pursue Step 2 of the Grievance Procedure, provided the grievance is reduced to writing, setting forth the relevant information concerning the alleged grievance, including a short description hereof, the date on which the grievance occurred, and the provisions of the Agreement alleged to have been violated.

- (a) Should the Local Union(s) or the Project Contractor or any Contractor have a dispute with the other party and if, after conferring, a settlement is not reached within three (3) working days, the dispute may be reduced to writing and proceed to Step 2 in the same manner as outlined herein for the adjustment of an employee complaint.

Step 2. The International Union Representative and the involved Contractor shall meet within seven (7) working days of the referral of a dispute to this second step to arrive at a

satisfactory settlement thereof. Meeting minutes shall be kept by the Contractor. If the parties fail to reach an agreement, the dispute may be appealed by the Union, in writing, in accordance with the provisions of Step 3.

Step 3. (a) If the grievance has been submitted but not adjusted under Step 2, either party may request in writing, within seven (7) calendar days thereafter, that the grievance be submitted to an Arbitrator mutually agreed upon by them. The Contractor and the involved Union shall attempt mutually to select an arbitrator, but if they are unable to do so, they shall request the Federal Mediation and Conciliation Services (FMCS) to provide them with a list of arbitrators from which the Arbitrator shall be selected. The rules of FMCS shall govern the conduct of the arbitration hearing. The decision of the Arbitrator shall be final and binding on all parties. The fee and expenses of such Arbitration shall be borne equally by the Contractor and the involved Local Union(s).

Section 4. Failure of the grieving party to adhere to the time limits established herein shall render the grievance null and void. Failure of the Contractor to adhere to the time limits established herein shall result in the grievance being sustained. The time limits established herein may be extended only by written consent of the parties involved at the particular step where the extension is agreed upon. The Arbitrator shall have the authority to make decisions only on issues presented to him or her, and he or she shall not have authority to change, amend, add to or detract from any of the provisions of this Agreement.

Section 5. The Owner shall be notified of all actions at Steps 2 and 3 and shall, upon their request, be permitted to participate in all proceedings at these steps.

ARTICLE VIII

JURISDICTIONAL DISPUTES

Section 1. The assignment of work will be the responsibility of the Contractor performing the work involved and such work assignments will be in accordance with decisions issued under the Plan for the Settlement of Jurisdictional Disputes in the

Construction Industry (the "Plan"), or any successor Plan, adopted by the National Building and Construction Trades Department.

Section 2. All jurisdictional disputes on this Project, between or among Building and Construction Trades Unions and employers, parties to this Agreement, shall be settled and adjusted according to the present Plan established by the Building and Construction Trades Department or any other plan or method of procedure that may be adopted in the future by the Building and Construction Trades Department. Decisions rendered shall be final, binding and conclusive on the Contractors and Unions parties to this Agreement.

Section 3. All jurisdictional disputes shall be resolved without the occurrence of any strike, work stoppage, or slow-down of any nature, and the Contractor's assignment shall be adhered to until the dispute is resolved. Individuals violating this section shall be subject to immediate discharge.

Section 4. Each Contractor will conduct a pre job conference with the appropriate Council prior to commencing work. The Owner will be advised in advance of all such conferences and may participate if they wish.

ARTICLE IX

MANAGEMENT'S RIGHTS

Section 1. Exclusive Owner - Workforce. Except as otherwise provided in this Agreement, the Owner (or its designee) and the Contractors retain the authority for the management of their operations and workforces.

Section 2. Materials, Design, Machinery, Equipment. There shall be no limitation or restriction by a signatory Union upon a Contractor's choice of materials or design, nor, regardless of source or location, upon the full use and utilization of equipment, machinery packaging, pre-cast, pre-fabricated, pre-finish, or pre-assembled materials, tools or other labor saving devices. The on-site installation or application of all items shall be performed by the craft having jurisdiction of such work; provided, however, that installation of specialty items may be performed by employees employed under this Agreement who may be directed by other personnel in a supervisory role, in circumstances requiring special knowledge of the particular items.

Section 3. New Technology, Equipment. The use of new technology, equipment, machinery, tools and/or labor saving devices and methods of performing

work may be initiated by any Contractor from time to time during the Project. The Union agrees that it will not in any way restrict the implementation of such new devices or work methods.

Section 4. Disputes. If there is any disagreement between any Contractor and the Union concerning the manner or implementation of such device or method of work, the implementation shall proceed as directed by the Contractor, and the Union shall have the right to grieve and/or arbitrate the dispute as set forth in Article VII of this Agreement.

ARTICLE X

WORK STOPPAGES

Section 1. No Strikes or Work Disruptions. There shall be no strike, sympathy strike, jurisdictional strike, recognitional strike, slowdown, sabotage, work to rule, sickout, sit down, picketing of any type (including informational picketing), handbilling, boycott, interruption of work or any disruptive activity that interferes with or interrupts in any way work on the Project. The applicable local union shall not sanction, aid or abet, encourage or continue any work stoppage, strike, picketing or other disruptive activity which violates this Article and shall undertake all reasonable means to prevent or to terminate any such activity. No employee shall engage in activity which violates this Article. Any employee who participates in or encourages any activity which violates this Article shall be subject to disciplinary action, including discharge, and if justifiably discharged for the above reasons, shall not be eligible for rehire on the same project for a period of not less than ninety (90) days. Further, if the Local Union is unable to provide qualified replacements for those employees who are in violation of this Article by the beginning of the next shift, the Employer is free to hire from any source.

Section 2. Union Responsibilities. The Local Union shall not be liable for acts of employees for which it has no responsibility. The principal officers of the Local Union will immediately instruct, order and use their best efforts to cause the members of the Local Union they represent to cease any violations of this Article. If it complies with this obligation, the Local Union shall not be responsible for unauthorized acts of employees it represents.

ARTICLE XI

WAGES AND BENEFITS

Section 1. Wages. All employees covered by this Agreement shall be classified in accordance with work performed and paid 100% of the wages and 100% of the benefits as established in the respective Craft's Collective Bargaining Agreement and any subsequent modifications thereto. The Contractor, upon request, shall provide the Unions and Owner with substantiation that wages and benefits are being paid on the Project. The Unions shall provide the Owner, and any Contractor or subcontractor that is party to this Agreement, with wage, fringe benefit and dues reporting forms.

Section 2. Payment of Benefits/Contributions. Each Contractor will also pay all required contributions in the amounts required by Section 1 of this Article to the established employee benefit funds that accrue to the direct benefit of the employees (such as pension and annuity, health and welfare, vacation, apprenticeship, training funds). With respect to contributions required in this Section to Employer-Union jointly trusted funds, the Contractor adopts and agrees to be bound by the written terms of the legally established trust agreement specifying the detailed basis on which payments are to be made into, and benefits paid out of, such Trust Funds. The Contractor authorizes the parties to such Trust Funds to appoint Trustees and successor Trustees to administer the Trust Funds and hereby ratifies and accepts the Trustees so appointed as if made by Contractor.

Section 3. Non-Affiliated Labor Organizations. The Contractor shall deduct from each employee's wages all uniform dues and working assessments set forth in the Employee's Local Collective Bargaining Agreement. If a labor organization is not affiliated with the Council, and supplies its members or referrals for work on the Project, such labor organization shall pay to the Council the dues and assessments it would owe the Council if affiliated, for all periods during which the labor organization has members or referrals working on the Project. Any disputes under this paragraph shall be resolved exclusively between the labor organization and the Council by using the grievance procedure appearing in Article VII, as provided herein. All grievances shall be reduced to writing within thirty (30) days of the date on which the aggrieved party discovered the dispute. The grievance shall be initiated at Article VII, Section 3, Step 3.

ARTICLE XII
LOCAL UNION NEGOTIATIONS DURING
THE PENDENCY OF THE AGREEMENT

Section 1. All parties to this Agreement understand and acknowledge that some crafts who will be working on the Project are covered by local collective bargaining agreements that will expire prior to the projected completion of the Project. All parties understand and agree that irrespective of whether such local collective bargaining agreement negotiations are successful or unsuccessful, there shall be no strike, sympathy strike, jurisdictional strike, recognitional strike, slowdown, sabotage, work to rule, sickout, sit down, picketing of any type (including informational picketing), handbilling, boycott, interruption of work or any disruptive activity that interferes with or interrupts in any way work on the Project by any Union involved in such local negotiations, or by any of its members, nor shall there be any lockout by a Contractor on the Project affecting such union or its members during the course of such negotiations. Irrespective of the status of any such local collective bargaining agreement negotiations, the affected Union and all of its members will observe and fully comply with the provisions of this Agreement. Should any Local Union fail or refuse to provide and/or refer qualified employees for work on the Project during an economic strike, any affected Contractor shall be permitted to utilize the procedures appearing in Article VI, Section 5 of this Agreement.

Section 2. Wage/Benefit Increases. Should a craft covered by this Agreement negotiate an increase in wages or an increase in benefits with any Contractor to become effective during the term of the Project, those wage and/or benefit increases shall be paid by the affected Contractor, as of the effective date of those increases, to those employees in that craft performing work covered by this Agreement.

ARTICLE XIII
HOURS OF WORK, OVERTIME, SHIFTS AND HOLIDAY

Section 1. Work Day and Work Week. Except as provided in Section 4, the first shift shall consist of eight (8) or ten (10) hours per day between the hours of 6:00 a.m. and 5:30 p.m., plus one-half (1/2) hour unpaid for lunch, approximately mid-way through the shift. Forty (40) hours per week shall constitute a regular week's work, whether consisting of five (5) eight (8) hour days, or four (4) ten (10) hour days.

The work week will start on Monday and conclude on Sunday. A uniform starting time will be established for all crafts on each project or segment of the work. Nothing herein shall be construed as guaranteeing any employee eight (8) or ten (10) hours per day or forty (40) hours per week. The Union(s) shall be informed of the work starting time set by the contractor at the pre job conference which may be changed thereafter upon three (3) days' notice to the Union(s) and the employees. A second shift, if used, shall consist of eight hours between 3:00 p.m. and 1:00 a.m.; a third shift, if used, shall begin between 10:00 p.m. and 1:00 a.m. For purposes of Section 3, the third shift shall be considered as part of the prior day's work.

Section 2. Starting Times. Employees shall be at their place of work at the starting time and shall remain at their place of work (as designated by the Contractor) performing their assigned functions until quitting time, which is defined as the scheduled end of the shift. The parties reaffirm their policy of a fair day's work for a fair day's wage. There shall be no pay for time not worked unless the employee is otherwise engaged at the direction of the Contractor.

Section 3. Overtime. Overtime shall be defined as all hours worked in excess of forty (40) hours in a work week or, for 8 hour shifts, in excess of eight (8) hours per day; or for 10 (ten) hour shifts for work in excess of 10 hours per day; such work and work performed on Saturdays shall be paid at one and one-half times the straight time rate of pay. However, in scheduled four (4) day/ten hour shift work weeks, Friday may be scheduled as a "makeup" day at straight time to make up for a day lost (Monday through Thursday) due to inclement weather. In addition, if a "make-up" day is scheduled, all employees directed to work on such day will be guaranteed a minimum of four (4) hours work or pay. In any week in which employees on the Project are scheduled on four/ten hour shifts, an employee whose first day of work on the Project begins on Wednesday or later day of the schedule shall be paid, during the first week of his employment only, time-and-one-half for all hours worked in excess of eight in a day or each day he works during said week. Work on Sundays and holidays shall be at double time. There shall be no restriction on any contractor's scheduling of overtime or the non-discriminatory designation of employees who will work. The contractor shall have the right to schedule work so as to minimize overtime. There shall be no pyramiding of overtime pay under any circumstances.

Section 4. Shifts.

- (a) Shift work may be performed at the option of the Contractor(s) upon three (3) days' prior notice to the Union and shall continue for a period of not less than five (5) working days. Saturdays and Sundays, if worked, may be used for establishing the five (5) day minimum work shift. If two shifts are worked, each shall consist of eight (8) hours of continuous work exclusive of a one-half (½) hour non-paid lunch period. Any third shift shall consist of seven (7) hours of continuous work exclusive of one-half (½) hour non-paid lunch period for eight (8) hours pay. A premium of \$.25 per hour shall be paid for work on the second shift and \$.50 per hour for work on the third shift.
- (b) The Contractor may establish a work week of four (4) consecutive ten (10) hour work days (exclusive of one-half (½) hour unpaid lunch, approximately midway through the shift) between Monday through Thursday.

Section 5. Minimum Pay. An employee who reports for work at the regular starting time and for whom no work is provided shall receive pay equivalent to two (2) hours at the applicable hourly rate, provided the employee at the employer's discretion remains available for work. Any employee who reports for work and for whom work is provided shall be paid for actual time worked but not less than two (2) hours. It will not be a violation of this agreement when the employer considers it necessary to shut down to avoid the possible loss of human life, because of an emergency situation that could endanger the life and safety of an employee. In such cases, employees will be compensated only for the actual time worked. In the case of a situation described above where the employer requests employees to remain available for work, the employees will be compensation for such time. If a project is shut down because of weather, employees, who report for work, shall be paid actual time worked but not less than two (2) hours. Procedures for prior notification of work cancellation shall be determined at the pre-job conference. The provisions of this section are not applicable where the employee voluntarily quits or lays off.

Section 6. Holidays. Holidays shall be New Year's Day, Good Friday, Memorial Day, Independence Day, Labor Day, Veteran's Day, Thanksgiving Day, the Day after Thanksgiving Day, and Christmas Day. A holiday falling on Saturday shall be observed on the preceding Friday. A holiday falling on Sunday shall be observed

on the following Monday.

Section 7. Meal Period. The Contractor will schedule a meal period of not more than one-half hour duration at the work location at approximately the mid-point of the scheduled work shift (4 hours in a five day work week, 5 hours in a four-day work week), consistent with Section 1; provided, however, that the Contractor may, for efficiency of the operation, establish a schedule which coordinates the meal periods of two or more crafts. If an employee is required to work through his meal period, he shall be compensated for the time worked at the applicable overtime rate and the employee shall, when work permits, eat his lunch "on the fly".

Section 8. No Organized Work Breaks. There will be one (1) break during the first four (4) hours of a shift which shall be taken at the employee's work station. Individual nonalcoholic beverage containers will be permitted at the employee's work station.

Section 9. Helmets to Hardhats.

- (a) The Employers and the Unions recognize a desire to facilitate the entry into the building and construction trades of veterans who are interested in careers in*the building and construction industry. The Employers and Unions agree to utilize the services of the Center for Military Recruitment, Assessment and Veterans Employment (hereinafter "Center") and the Center's "Helmets to Hardhats" program to serve as a resource for preliminary orientation, assessment of construction aptitude, referral to apprenticeship programs or hiring halls, counseling and mentoring, support network, employment opportunities and other needs as identified by the parties.
- (b) The Unions and Employers agree to coordinate with the Center to create and maintain an integrated database of veterans interested in working on this Project and of apprenticeship and employment opportunities for this Project. To the extent permitted by law, the Unions will give credit to such veterans for bona fide, provable past experience.

ARTICLE XIV

APPRENTICES

Section 1. Need For. The parties recognize the need to maintain continuing

support of programs designed to develop adequate numbers of competent workers in the construction industry. The Contractor(s) will accordingly employ apprentices in their respective crafts to perform work on the Project within the apprentice's capabilities.

Section 2. Ratios. The Union agrees to cooperate with the Contractor in furnishing qualified apprentices as requested and if available. Apprentices shall perform the work of their craft in accordance with the ratios and terms in their governing collective bargaining agreements. To the extent requested by Owner, the Contractor(s) may use the maximum number of apprentices permitted by local collective bargaining agreements.

ARTICLE XV

DRUG AND ALCOHOL POLICY

Section 1. Drug and Alcohol Policy. All parties understand and agree that a drug and alcohol policy, approved by the Council, will be in force for all work performed under the Agreement. The drug and alcohol policy will prohibit the use, sale, transfer, purchase and/or possession of a controlled substance, alcohol and/or firearms while on the Project's premises and will require testing of employees. The drug and alcohol policy, attached hereto as Appendix 2, is incorporated into and made part of this Agreement and is implemented for all Contractors and employees working on the Project.

ARTICLE XVI

NON-DISCRIMINATION

Section 1. Policy. It is the continuing policy of the Owner, the Contractors and the Unions that the provisions of this Agreement shall be applied without discrimination because of age, race, sex, color, religion, creed, national origin, sexual orientation or any other basis prohibited by applicable law.

ARTICLE XVII

SOLE AND COMPLETE AGREEMENT

Section 1. The parties agree that this Agreement constitutes the sole and complete agreement between them governing the rates of pay and working conditions of the construction employees working on the Project. This Agreement settles all demands and issues on the matters subject to collective bargaining and that it shall not be modified or supplemented in any way except by written agreement executed by the

Owner and all parties.

ARTICLE XVIII

SEPARABILITY AND SAVINGS CLAUSE

Section 1. Intent of Parties. If any article or section of this Agreement shall be held invalid by law or by a tribunal of competent jurisdiction, or if compliance with or enforcement of any article should be restrained pending a final determination as to its validity, the remainder of this Agreement shall not be affected and shall remain in full force and effect. In the event that any article or section is held invalid, the parties hereto shall, upon the request of the Unions, enter into collective bargaining negotiations for the purpose of arriving at a mutually satisfactory replacement for such article during the period of invalidity or restraint. If the Owner and the Council cannot agree on a mutually satisfactory replacement, either party shall be permitted to submit its demand to formal interest arbitration.

Section 2. Force of Agreement. The parties recognize the right of the Owner to withdraw, at its absolute discretion, the utilization of this Agreement as part of any bid specification should a court of competent jurisdiction issue any order which could result, temporarily or permanently, in delay of the bidding, awarding, and/or construction work on the Project. Notwithstanding such an action by the Owner, or such court order, the parties agree that the Agreement shall remain in full force and effect on the Project, to the maximum extent legally possible. It is hereby agreed that this Agreement covers all of the signatory local unions listed below.

Section 3. Delegation. The Owner, in its sole and absolute discretion has the right to delegate its duties hereunder to a representative and/or designee who may be either an employee of Owner or a third party with whom Owner has contracted for contractor services.

OWNER
CITY OF CANTON

EAST CENTRAL OHIO BUILDING &
CONSTRUCTION TRADES COUNCIL,
AFL-CIO

David Krueger

PRESIDENT

APPROVED AS TO FORM

[Signature]

CANTON LAW DIRECTOR *DWB*

SIGNATORY LOCAL UNIONS

Ironworkers Local 530
Name of Union

By: W. L. 80
Business Manager
Title

LABORERS LOCAL 1015
Name of Union

By: Curt Mayle
Business Manager
Title

PLASTER & CEMENT MASONS LOCAL 109
Name of Union

By: Greg Daniels
BUSINESS MANAGER
Title

I.B.E.W. 540
Name of Union

By: Phil D. Wilbain
BUS. MNGR / FINAN-SECY
Title

Bricklayers Local No 6
Name of Union

By: Burt L. Tamm

Field Rep.
Title

SHEETMETALWORKERS 33
Name of Union

By: JEFF DUBOIS

BUSINESS REP.
Title

Painters Local 841
Name of Union

By: Jeff

Business Rep.
Title

Glaziers Local 1162
Name of Union

By: Jeff

Business Rep.
Title

Name of Union

By: _____

Title

Name of Union

By: _____

Title

Name of Union

By: _____

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By: _____

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By: _____

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Name of Union

By: _____

Title

APPENDIX 1
LETTER OF ASSENT TO THE PROJECT LABOR AGREEMENT

FOR TRINITY PLACE AND CAPRICE AVENUE NW SANITARY MANHOLE
REHABILITATION PROJECT (G.P. 1174)

Pursuant to Article I, Section 1 of the Project Labor Agreement (the "Agreement") for the Trinity Place and Caprice Avenue NW Sanitary Manhole Rehabilitation Project, the undersigned party hereby agrees that it will comply with and be bound by all of the terms and conditions of the Agreement and agrees to all approved amendments or revisions thereto.

This Letter of Assent shall ONLY apply to the above-referenced Project and shall remain in effect for the duration of the above-referenced Project, after which this understanding will automatically terminate without further notice.

For the Contractor (or Subcontractor of whatever tier):

Name of Contractor/Subcontractor: _____

Name and Signature of Authorized Person:

(Print Name) _____

(Title) _____

(Signature) _____

(Phone #) _____

(Date) _____

APPENDIX 2
EMPLOYEE DRUG AND ALCOHOL TESTING POLICY
SPECIFICATIONS

The Owner is committed to providing a safe workplace for the workers assigned the Project, promoting high standards of employment health, and fostering productivity that satisfies its quality expectations. Consistent with the intent and spirit of this commitment, the Owner and ECOB & CTC have established a substance abuse testing specification for the Project with the goal of maintaining a work environment that is free from the effects of the use of illegal drugs and alcohol. The Owner will implement the terms of this policy.

This specification is not intended as a substitute for the Contractors' complete written substance abuse policy. Normally, such policies include other important features, including, but not limited to, an employee education and awareness Program, a supervisor training program and an employee assistance program.

The policy for this Project requires that any construction employee entering the project site will comply with the substance abuse testing requirements as outlined in this section. The Owner reserves the right to amend this specification upon written notice to the Contractor and the Unions on the Project. The parties to this agreement shall recognize the Drug Free Work Site Program as implemented through participating Unions and/or Contractors as administered by the contractor, or for contractors who are not signatory to agreements with signatory unions belonging to ECOB & CTC, and their core employees, an equivalent program that meets the specifications, contractual requirements, and testing requirements as set forth in this Appendix 1.

CONTRACTUAL REQUIREMENTS

All Contractors must have and enforce a written Substance Abuse Program incorporating the testing requirements, term, and conditions set forth in this specification. This specification is applicable to all employees, current and prospective, in order to be eligible to perform work at the Project. The Contractors must comply with the specification. Suppliers, vendors, and visitors are subject to confirmation of their abstinence from the possession or use of substances indicated in this specification. A copy of each contractor's substance abuse program must be

submitted to the Owner for approval prior to commencement of any work on the Project site.

The substance abuse program must apply to all employees working on the Project and subcontractors' of any of tier working on the Project site. This includes workers, new hires, replacement workers, and supervisory personnel. No employee or prospective employee of a Contractor shall be permitted to work on the Project site unless such employee has submitted to testing by this specification and unless the results of such testing are negative as hereinafter defined. The Contractor must provide the Owner with a Monthly Summary Report of the Substance Abuse Program compliance.

All Contractors must train their respective employees in methods that will allow them to recognize substance abusers. Supervisory Employees of the Owner or its subcontractor shall be trained to take action, and to confront a substance abuser in a manner consistent with generally accepted safety-training procedures.

The cost of implementing the Substance Abuse program shall be borne by each respective Contractor affected by this specification.

Suppliers, vendors, and visitors must become signatory to the terms of this specification and their abstinence from substance abuse, and their continued avoidance of violations of the specification at the project site. Furthermore, in the event of an incident and/or accident occurrences involving suppliers, vendors, and/or visitors, the same agrees to submit to the substance abuse testing when requested. Refusal to comply would be grounds to have the supplier, vendor, or visitor permanently barred from the Project site by regulators.

TESTING REQUIREMENTS

The Project requires:

- Post-offer/Pre-engagement drug and alcohol testing.
- Testing for reasonable suspicion of illegal drug use or alcohol use.
- Post accident and post incident drug and alcohol testing upon reasonable suspicion.
- Drug testing following discovery of illegal or unauthorized drugs or paraphernalia as creating reasonable suspicion.

All Prime Contractors must perform post-offer/pre-engagement, and post

accident/incident testing upon reasonable suspicion, as follows:

- a. All drug testing must be conducted by a National Institute of Drug Abuse (NIDA) certified laboratory with test results interpreted by a licensed medical review officer (MRO).
- b. The initial screen tests for alcohol shall be performed by using either a saliva test or breathalyzer test comparable to the type used by state or local law enforcement officials. Furthermore, alcohol confirmatory tests shall be performed by using either blood alcohol test or a Breathalyzer test comparable to the type used by state or local law enforcement officials.
- c. Evidence of the negative test results of individual employees required by this specification shall be furnished to the Owner prior to the commencement of work by the individual employee and promptly after performance of any subsequent testing required by this specification. Acceptable negative test result format.
 - A certificate signed by the testing laboratory, setting forth the nature and results of performed; or
 - An identification card signed by the respective Prime Contractor and issued to the individual employee, setting forth as reported on a certificate issued by the testing laboratory. The name of the testing laboratory shall also appear on the identification card; provided the affected employee authorizes the issuance of such identification card.

COMPLIANCE PROCEDURE

The Owner reserves the right to audit any substance abuse program required by this specification to verify compliance results within twenty-four (24) hours of notification of the intent to audit. The Owner shall have free right of access to all relevant records of the Prime Contractor and their subcontractors and supplies for this purpose, provided such record disclosures are within the scope of the States guidelines pertaining to confidentiality of employee records.

The Contractor's pre-engagement employees who receive a positive test result shall immediately leave the Project Site. Transportation of employees receiving the positive test result is the direct responsibility of the employing Prime Contractor, including employees of its subcontractors. Furthermore, pre-engagement employees

receiving a positive test shall not be permitted to return to the Project Site earlier than 90 days from the date of the positive test. At this time the employee may begin the process outlined by this specification again.

DEFINITIONS/ CONFIDENTIALITY/RULES- DISCIPLINARY ACTIONS-
GRIEVANCE PROCEDURES

1. DEFINITIONS:

- (a) Company Premises - the term "Company Premises" as used in this policy includes all property, facilities, land, building, structures, automobiles, trucks and other vehicles owned, leased or used by the Contractor on the Project. Construction job sites for which the Contractor has responsibility are included.
- (b) Prohibited Items & Substances - Prohibited substances include illegal drugs (including controlled substances, look alike drugs and designer drugs, alcoholic beverages, and drug paraphernalia in the possession of or being used by an employee on the job.
- (c) Employee - Individuals, who perform work for the Contractor, including, but not limited to management, supervision, engineering, craft workers and clerical personnel.
- (d) Accident - Any event resulting in injury to a person or property to which an employee, or contractor/contractor's employee, contributed as a direct or indirect cause.
- (e) Incident - An event which has all the attributes of an accident, except that no harm was caused to person or property.
- (f) Reasonable Cause - Reasonable cause shall be defined as tardiness, excessive absenteeism, and erratic behavior such as noticeable imbalance, incoherence, and disorientation.

2. CONFIDENTIALITY

- (a) All parties to this policy and program have only the interests of employees in mind; therefore, encourage any employee with a substance abuse problem to come forward and voluntarily accept our assistance in dealing with the illness. An employee assistance program will provide guidance and direction for you during your recovery period. If you volunteer for help, the Contractor

will make every reasonable effort to return you to work upon your recovery. The Contractor will also take action to assure that your illness is handled in a confidential manner.

- (b) All actions taken under this policy and program will be confidential and disclosed only to those with a "need to know."
- (c) When a test is required, the specimen will be identified with a code number, not by name, to insure confidentiality of the donor. Each specimen container will be properly label and made tamper proof. The donor must witness this procedure.
- (d) Unless an initial positive result is confirmed as positive, it shall be deemed negative and reported by the laboratory as such.
- (e) The handling and transportation of each specimen will be properly documented through the strict chain of custody procedures.

3. RULES - all employees must report to work in a physical condition that will enable them to perform their jobs in a safe and efficient manner. Employees shall not:

- (a) Use, possess, dispense or receive prohibited substances on or at the Project job site; or
- (b) Report to work at or on the Project with any measurable amount of prohibited substances in their system.

4. DISCIPLINE - When the Contractor has reasonable cause to believe an employee is under the influence of a prohibited substance, for reasons of safety, the employee may be suspended until test results are available. If no test results are received after three (3) working days, the employee, if available, shall return to work with back pay. If the test results prove negative, the employee shall be reinstated with back pay. In all other cases:

- (a) Applicants testing positive for drug use will not be hired.
- (b) Employees who have not voluntarily come forward, and who test positive for a drug use, will be terminated.
- (c) Employees who refuse to cooperate with testing procedures will be terminated.
- (d) Employees found in possession of drugs or drug paraphernalia will be terminated.

(e) Employees found under the influence of alcohol while on duty, or while operating a company vehicle, will be subject to termination.

5. PRESCRIPTION DRUGS - Employees using a prescribed medication which, in their physician's opinion, may impair the performance of their duties, either mental or motor functions, must immediately inform the supervisor of such prescription drug use if instructed by their physician to do so. For the safety of all employees, the Contractor will consult with you and your physician to determine if a reassignment of duties is necessary. The Contractor will attempt to accommodate your needs by making an appropriate reassignment. However, if a reassignment is not possible, you will be placed on temporary medical leave until released as fit for duty by the prescribing physician.

APPENDIX

F

Existing Manhole Photos



01/01/2008

MH # 1



01/01/2007

MH #2



01/01/2007

MH #3



MH #4



MH #5

APPENDIX

G

Cost Proposal

PROPOSAL

Canton, Ohio, _____ 20 ____

To the Service Director of the City of Canton:

The undersigned, having carefully examined the site of the proposed work, the plans, profiles and standard drawings and specifications therefore, herewith propose to furnish all the labor and materials required for Trinity Place and Caprice Ave. N.W. Sanitary Manhole Rehabilitation, G.P. #1174 including any and all work and materials that may be necessary to connect the work to be done with the adjoining work, in a proper and workmanlike manner, and in accordance with drawings on file in the office of the City Civil Engineer, and upon the terms and conditions of the within specifications and under the direction of and to the satisfaction of the City Engineer and the Service Director of said City.

The bidder herein agrees that the Service Director has the right to reject any or all bids and that the bidder shall not dispute the correctness of the quantities used in computing the lowest and best bid.

The bidder hereby certifies that the undersigned _____ the only person interested in the bid and the bidder herewith certifies that no officer or employee of the City of Canton is in any manner interested therein. The bidder agrees that should all or either of said bids be accepted, to enter into the prescribed contract within ten (10) days from and after the date of service of notice of such acceptance, for the faithful performance of the labor and furnishing of the materials in such bid or bids so accepted, and to fully complete the said work within 150 calendar days.

The bidder herewith encloses a bond or certified check _____ in the sum of _____ dollars made payable to the Service Director of the City of Canton as guaranty that if awarded the contract for the work included in this proposal, _____ will enter into contract therefore, with sureties satisfactory to the Service Director, within the prescribed time of ten (10) days from the date of service of notice of award, otherwise such bond or check shall become the property of said City, as liquidated damages of the failure on the Bidder's part to so contract within specified time.

ADDRESS

RESPECTFULLY SUBMITTED

Bidder

ITEM REF NUMBER	ITEM SPEC NUMBER	ITEM DESCRIPTION	ESTIMATED QUANTITY	UNITS	UNIT COST	TOTAL COST
1	ODOT 624	MOBILIZATION	1	LS		
2	02485	SEEDING AND MULCHING, AS PER PLAN (A.P.P.)	1	LS		
3	02500	ASPHALT PAVEMENT AND CURB REMOVAL AND REPLACEMENT, A.P.P.	40	SY		
4	02534	SEWER FLOW CONTROL, A.P.P.	1	LS		
5	02560	MANHOLE #1 REPLACEMENT, A.P.P.	1	LS		
6	02566	MANHOLE #2 REHABILITATION, A.P.P.	1	LS		
7	02566	MANHOLE #3 REHABILITATION, A.P.P.	1	LS		
8	02566	MANHOLE #4 REHABILITATION, A.P.P.	1	LS		
9	02560	MANHOLE #5 REPLACEMENT, A.P.P.	1	LS		
10	02566	MANHOLE #6 REHABILITATION, A.P.P.	1	LS		
11	02630	8-INCH DIAMETER PVC SDR 35, SANITARY SEWER REMOVAL AND REPLACEMENT, A.P.P.	20	LF		
12	SS 05-01	SEWER TELEVISION INSPECTION AND DOCUMENTATION, A.P.P.	1	LS		

TOTAL BID \$ _____

For informational purposes only, total unit prices will govern.