

TECHNICAL SPECIFICATIONS

This project shall be built in accordance with the New Mexico State Department of Transportation Standard Specifications for Highway and Bridge Construction State Construction Bureau, Current Edition and all applicable Supplemental Specifications and Revisions to the New Mexico State Department of Transportation Standard Specifications for Highway and Bridge Construction State Construction Bureau, as published by the New Mexico Department of Transportation except as modified by the City of Alamogordo Contract Documents and Technical Specifications and Special Provisions to the Contract Documents and Technical Specifications.

The Contract Documents will govern in the following order of importance:

1. City of Alamogordo Contract Documents, General Specifications Section 1 thru Section 13
2. City of Alamogordo Technical Specifications
3. Special Provisions to Contract Documents and Technical Specifications
4. Project Plan Drawings
5. NMDOT Standard Specifications, Division 200 through Division 900
6. NMDOT Supplemental Specifications
7. NMDOT Standard Drawings

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Article 01-002.1 GENERAL REQUIREMENTS

1.0 DEFINITIONS AND TERMS

Abbreviations

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| AASHTO .. | American Association of State Highway and Transportation Officials |
| ACI | American Concrete Institute |
| AGC | Associated General Contractors of America, Inc. |
| ANSI | American National Standards Institute |
| APWA | American Public Works Association |
| ASCE | American Society of Civil Engineers |
| ASME | American Society of Mechanical Engineers |
| ASTM | American Society for Testing and Materials |
| AWWA | American Water Works Association |
| BM | Bench Mark |
| FH | Fire Hydrant |
| G | Gas Line |
| ID | Inside Diameter |
| Inv. | Invert |
| MH | Manhole |
| mg/l | Milligrams per Liter |
| MUTCD | Manual on Uniform Traffic Control Devices |
| NEMA | National Electrical Manufacturers Association |
| NFPA | National Fire Protection Association |
| NMDOT .. | New Mexico Department of Transportation |
| NMSA | New Mexico Statutes Annotated--1978 Compilation as Amended |
| OHP | Overhead Power |
| OHP&T ... | Overhead Power & Telephone |

| | |
|-----------|--|
| OHT | Overhead Telephone |
| OSHA..... | Occupational Safety and Health Association |
| PC | Point of Curvature |
| ppm | Parts per Million |
| PRC | Point of Reverse Curvature |
| psf | Pounds per Square Foot |
| psi | Pounds per Square Inch |
| PT | Point of Tangency |
| PVC | Polyvinyl chloride Pipe |
| Pvmt. ... | Pavement |
| Q | Rate of Flow |
| RCP | Reinforced Concrete Pipe |
| SCCP | Steel Cylinder Concrete Pipe |
| Sec | Section |
| Sta. | Station |
| Std. | Standard |
| UGT | Underground Telephone |
| UL | Underwriters' Laboratories, Inc. |
| V | Velocity |

Definitions

Alley – A minor public way intended for secondary service access to the rear side of a lot or piece of property.

City - The City of Alamogordo and all assigned representatives.

City Engineer – The City of Alamogordo's Engineer.

Contract Documents - The written AGREEMENT between the CONTRACTOR and the OWNER setting forth the obligations of the parties thereunder, including but not limited to the performance of the Work and the Basis of Payment. The Contract Documents

include: the Advertisement for Bids, Addenda, Instructions to BIDDERS, CONTRACTOR's Bid, the Performance Bonds and Labor and Payment Bond (for both CONTRACTOR and SUBCONTRACTOR, if applicable to SUBCONTRACTOR), the Certificate of Insurance, the Statement of BIDDER's Qualifications, the Campaign Contribution Disclosure Form, the Notice of Award, the Notice to Proceed, these General Conditions, the Contract Specifications, any Special Conditions, any referenced Specifications or Standards, Drawings and Plans, and all Modifications to the above, including Change Orders and extensions of Contract Time, all of which constitute one instrument.

CONTRACTOR - The person, firm, or corporation with whom an owner has executed the AGREEMENT.

Cul-De-Sac – A local street with only one (1) outlet having an appropriate terminus for the safe and convenient reversal of traffic movement.

Drawings or Plans - The drawings which show the character and scope of the Work to be performed and which have been prepared or approved by an ENGINEER and are referred to in the Contract Documents.

Driveway, Private – A vehicular way not serving more than one (1) lot or parcel of land.

Driveway, Common – A vehicular way serving more than one (1) lot or parcel of land.

ENGINEER - The person or firm designated by an owner, who is responsible for providing engineering services.

Easement, Private – A right-of-use granted for the limited use of private land owners and where general use and maintenance of such area is governed by an agreement which runs with the land. This easement is serviceable only by mutual consent of all of the parties that benefit from the Easement.

Easement, Public – An easement dedicated for use by the public, which is included within the dimensions or areas of lots or parcels of land.

Field Order - A written order issued by an ENGINEER or Public Works Inspector which clarifies or interprets the Plans and Specifications. See Section 12, General Conditions.

Frontage Road – Used to relieve Major Arterial streets of side traffic.

Grade – The slope of any surface specified in percentage terms or in terms of elevation.

Grading – Any disturbance of the surface of the land with earth moving equipment.

Intersection – the location where two (2) or more streets cross at grade.

Median – A strip that separates the opposing flows of traffic on a street.

OWNER – The City of Alamogordo, New Mexico, a New Mexico municipal corporation. The term "City" may be used interchangeably with the term "OWNER".

Pedestrian Way – A specifically designated place, means, or way by which pedestrians shall be provided safe, adequate and usable circulation; normally provides access through the interior of a property or development. Does not include street or vehicular easement or right-of-way or required sidewalk along a street or vehicular way.

Property Line – The line(s) of record bounding a lot or other parcel of land.

Project - The entire construction to be performed as provided in the Contract Documents.

Project Manager – The OWNER's representative who is delegated the responsibility for administration of the Project and who is the primary point of contact for the CONTRACTOR.

Public Works Inspector – An authorized representative of OWNER who is assigned to inspect the Project or any part thereof.

Reference Specifications, Test Methods, and Applicable Codes - All Standard Specifications and test methods of any society, association, or organization, referred to herein, are hereby made a part of these Technical Standards the same as if written in full. (Any reference to a paragraph or subparagraph within an article shall include all general provisions of the article to which reference is made.) References to such Standards refer to the latest published issues as of the date of the Invitation to Bid, unless otherwise specified. Reference to local or state codes and laws shall mean the latest adopted and published codes as of the date of the Invitation to Bid, unless otherwise specified.

Service Connections - Service Connections shall be construed to mean all or any portion of the pipe, conduit, cable, or duct which connects a utility main or distribution line to a building, home, residence, or property.

Shop Drawings - All drawings, diagrams, illustrations, brochures, schedules, and other data which are prepared by CONTRACTOR, a Subcontractor, manufacturer, Supplier, or distributor which have been approved by OWNER and/or the City Engineer and which illustrate the equipment, material, or some portion of the Work.

Special Conditions - Conditions which modify any article or paragraph of these Technical Standards.

Specifications (also Technical Specifications) – Those portions of the Contract Documents consisting of written technical description of materials, equipment, construction systems, standards and workmanship as applied to the Work.

Street – A right-of-way dedicated to the use of the public by which vehicles and pedestrians shall have lawful and usable ingress and egress, which has been accepted for maintenance and control by the City, County or State. See Section 3 of the Detail Drawings for street classifications.

Street, Stub – A street that has been designed to allow for the future extension of the street through subsequent developments.

Subcontractor - An individual, firm or corporation having a direct contract with CONTRACTOR or with any other Subcontractor for the performance of a part of the Work at the site, and who has a current City of Alamogordo Business Registration.

Utility - Overhead or underground wires, pipes, conduits, ducts, or structures, operated and maintained in or across a public right-of-way or easement or private easement operated and maintained to supply such commodities as water, gas, power, telephone, cable television, or sewer.

A. Public Utility - Owned and operated by a municipality or another political subdivision of the state.

B. Private Utility - Owned and operated by a private company or corporation.

Work - Any and all obligations, duties, and responsibilities necessary to the successful completion of the Project assigned to or undertaken by CONTRACTOR, including all labor, materials, equipment, incidentals, and the furnishing and installation thereof.

1.1 DESCRIPTION

The Work will consist of construction of a new right turn lane, realigning the parking lot entrance on the north side of Panorama Boulevard to line up with Hamilton Road, installation of new street lights, milling and overlaying the roadway, installing new striping, and installing conduit for a future signal, all within the city limits of Alamogordo, New Mexico.

The CONTRACTOR is required to locate all existing utilities prior to commencing Work on the Project. It shall be the CONTRACTOR's sole financial and legal responsibility to field verify locations and depths of all existing utilities and coordinate any relocation Work required.

The CONTRACTOR shall be required to maintain adequate temporary access for the private residences and the businesses and facilities within the construction area, to the satisfaction of the City Engineer and/or Public Works Inspector.

At the end of each Work day, or as required during each day, or as required due to weather conditions, the CONTRACTOR shall perform grading, shaping, and cleanup, to maintain an acceptable site condition, as determined by the ENGINEER.

2.0 WORKMANSHIP AND MATERIALS

These standards are prepared with the intention that only first-class workmanship and materials of the best quality will be provided. Materials and workmanship of less than best quality will not be acceptable. In the event that these Standards may not completely describe each and every part, item and detail, it will not relieve the CONTRACTOR of the full responsibility for providing the necessary part, item or Work necessary to complete the Project satisfactorily for proper operation, as intended.

The materials and equipment specified are considered the minimum standard of quality necessary to produce a satisfactory Project. Substitutions for the materials and

equipment that have been specified will not be permitted except on written approval of the City Engineer.

Any materials that are found to be damaged either before or after installation shall be removed promptly and replaced with new materials. The Public Works Inspector's inspection of the materials before they are installed shall not relieve the CONTRACTOR from any responsibility to furnish and install good quality materials, totally undamaged.

3.0 WATER FOR CONSTRUCTION

The use of reclaimed water is required on the Project. The CONTRACTOR will be responsible for purchasing all of the reclaimed water needed for construction from the City of Alamogordo. The cost will be determined in accordance with the current reclaimed water rates. Contact City of Alamogordo Water Billing Department at 575-439-4260. It shall be the CONTRACTOR's responsibility to transport and apply the reclaimed water as specified or as ordered by the ENGINEER.

Reclaimed (Purple) Hydrant Locations

1. Pivot Hydrant - at the extreme south Airport property – 3500 Airport Rd. - Only for Airport Projects. *(Must obtain special access permission)*
2. Airport Hydrant – approximately 850 feet north of the Airport on Airport Rd (address 3500 Airport Rd)
3. La Velle Hydrant/Fill Stand – approximately 1500 feet south of First Street on La Velle Rd. @ Booster Station; 223 La Velle Rd.
4. Michel St. Hydrant – approximately 250 feet west of Hwy 54 south on Michel St. (north of address 2150 US Hwy 54 south)
5. Civic Center Automated Fill Stand – off of S. Florida at 800 E. First Street, south side of the Sgt. Willie Estrada Memorial Civic Center
6. 26th Street Hydrant - Puerto Rico Av. @ 26th. Street (address 2518 Puerto Rico Ave)
7. Travis C. Hooser Ballfield Complex at 2143 S. Walker Ave. (2 Hydrants) – approximately 175 feet south of James St. on S. Walker Road

The CONTRACTOR shall meter the reclaimed water used at the hydrant from which the reclaimed water is taken. The CONTRACTOR shall furnish the meter or obtain a meter from the City for which he will have to pay a deposit, to be refunded when the meter is returned in good working order.

The CONTRACTOR shall furnish and maintain the piping and/or equipment necessary to connect to the reclaimed water source and to convey the reclaimed water into the CONTRACTOR's reclaimed water tank. CONTRACTOR shall not allow reclaimed water to go to waste during the tank filling operations, and he shall not allow his piping and equipment to leak water.

The tank filling equipment shall be placed and maintained in such a way as to provide prevention against accidents of any nature to CONTRACTOR personnel or the public in general.

The CONTRACTOR is required to connect the fill stand or fill equipment to the hydrant, and leave the hydrant valve open. CONTRACTOR shall install a valve in the fill stand piping to control the water flow.

The hydrant valve shall not be closed except when water will not be needed over a weekend or a period of two (2) or more days.

4.0 QUALITY ASSURANCE MATERIALS TESTING (GEOTECHNICAL)

A materials testing laboratory shall be retained by the City for Quality Assurance testing. The frequency of the Quality Assurance testing shall be as determined by the OWNER. The CONTRACTOR shall notify the testing laboratory and the Public Works Inspector when ready for each Quality Assurance test and cooperate fully in making way for the laboratory technician to make the required tests. If any of the Work fails to meet the standards specified, the CONTRACTOR shall correct such failures in a manner acceptable to the ENGINEER and/or the Public Works Inspector. The CONTRACTOR shall pay for the cost of all Quality Assurance re-testing necessary due to failure to meet Specification requirements on previous Quality Assurance testing. If the CONTRACTOR requests the testing laboratory to obtain density tests and the area to be tested is not ready when the technician arrives at the job site, the CONTRACTOR shall pay for all trip charges or stand-by time assessed. All cost for failed test and stand-by time will be deducted from the amount due on the Contract.

CONTRACTOR shall give Geotechnical Testing Lab a minimum of twenty-four (24) hours notice of readiness of the Work for Quality Control tests.

CONTRACTOR shall be responsible for providing to the OWNER the Proctor, Gradation and Liquid Limits of Subgrade material and Base Course material before testing of materials is required.

Material testing as referenced in this Section is for the OWNER's, Quality Assurance. The CONTRACTOR is responsible for Quality Control of material, process and method. Neither observations by ENGINEER nor inspections, tests or approvals by persons other than CONTRACTOR shall relieve CONTRACTOR from CONTRACTOR's obligations to perform the Work in accordance with the requirements of the Contract Documents

5.0 SURVEYING AND STAKING

The CONTRACTOR shall be responsible for all horizontal and vertical control required to build the Project, basic survey control will be provided by the City of Alamogordo. Any field adjustments made by the ENGINEER will be accepted as if incorporated herein and shall not make any claims for additional surveying or surveying expenses resulting therefrom.

6.0 SANITARY FACILITIES

The CONTRACTOR shall provide the necessary number of sanitary toilet units for all of the workers on the work site. The chemical toilets shall be moved along the Project routes so that they will be convenient for the workers.

Adequate potable drinking water shall be provided on the work site as well as drinking cups, for the benefit of all employees.

7.0 TRUCK BED COVERS

All trucks or other conveyances hauling any loose materials, including hot-mix bituminous materials, on public streets, highways and detours shall be of an approved type, and shall be covered in such a manner as to prevent such materials from dropping, sifting, leaking, or otherwise escaping therefrom. Coverings for trucks or other conveyances hauling loose materials as herein provided shall be securely fastened so as to prevent said covering or load from becoming loose, detached, or in any manner a hazard to public traffic. Any vehicles in violation of this provision will not be permitted to operate.

8.0 METHOD OF BIDDING

The Bid Schedule has been prepared for a Unit Price Contract procedure. All of the quantities shown in the Bid Schedule are estimated, and are not purported to be exactly correct. CONTRACTOR shall be required to furnish more or less of each estimated quantity that may be required to satisfactorily complete all of the Work. The CONTRACTOR will be paid on the unit basis for all of the material that is actually furnished and installed in the construction of the Project to plan dimensions. In no case shall the CONTRACTOR claim extra compensation for building any portion of the Project beyond plan dimensions.

9.0 UNDERGROUND AND OVERHEAD UTILITIES

Any interference with, or damage to, either underground or overhead utilities of any nature shall be the CONTRACTOR's legal and financial responsibility, saving the OWNER harmless from any or all claims resulting from damage to these utilities by reasons of his operations.

The CONTRACTOR shall contact New Mexico One-Call at 1-800-321-2537 or by cell phone at 811 to request field utility locates forty-eight (48) hours prior to digging

10.0 CONTRACTOR COMMUNICATIONS

The CONTRACTOR shall contact the OWNER, ENGINEER and the Department of Public Safety to provide information related to traffic control impacts, as well as to obtain any new requirements or restrictions for traffic control procedures.

11.0 SEQUENCE OF WORK

The Work shall be carried out with the intent of causing as little disruption as possible to the public. The CONTRACTOR shall perform clean up operations on a continuous basis. Any area requested to be cleaned up by the OWNER, ENGINEER and/or Public Works Inspector shall be cleaned immediately.

CONTRACTOR shall be responsible for advising the businesses, residents and occupants along each street as to when Work will be done in that particular area. CONTRACTOR will notify the businesses, residents and occupants not less than two (2)

days in advance of doing the Work. CONTRACTOR will request businesses, residents and occupants to move their vehicles out of the way of construction if required. If a problem develops with any resident or occupant, the CONTRACTOR shall report it to the OWNER and ENGINEER. The OWNER will assist in solving the resolution.

12.0 AUTHORITY AND DUTIES OF PUBLIC WORKS INSPECTOR(S)

Certified Inspectors representing the City of Alamogordo shall be authorized to inspect all Work done and all materials furnished. Such inspection may extend to all or any part of the Work and to the preparation, fabrication or manufacture of the materials to be used. The Public Works Inspector (Inspector) is not authorized to revoke, alter, or waive any requirements of the Specifications. The Public Works Inspector is authorized to call to the attention of the CONTRACTOR any failure of the Work or materials to conform to the Technical Standards and/or the Plans and Specifications, whichever is more strict. The Public Works Inspector shall have the authority to suspend the Work when an imminent hazard condition is known to exist, or when the CONTRACTOR either delays in correcting or permits repeated occurrences of a hazardous condition. This authority to suspend Work does not relieve the CONTRACTOR of the legal responsibility for safety at the jobsite.

The Public Works Inspector shall have the authority to suspend Work due to rejected materials or rejected Work only at the direction of the City Engineer or Project Manager. Any questions at issue as to quality of materials and/or Work installed may be referred to the OWNER and/or ENGINEER. If the CONTRACTOR refuses to suspend operations on verbal order, the Inspector shall issue a written order giving the reason for suspending the Work. After placing the order in the hands of the CONTRACTOR's person-in-charge, the Inspector shall immediately leave the job. Work done during the absence of the Inspector will not be accepted.

The Public Works Inspector shall in no case act as foreman or perform other duties for the CONTRACTOR, nor interfere with the management of the Work by the CONTRACTOR. Any advice which the Inspector may give the CONTRACTOR shall not be construed as binding the City in any way or releasing the CONTRACTOR from fulfilling all of the required Contract terms.

13.0 SANITARY LANDFILL

All waste and recyclable materials shall be disposed of or stockpiled in approved locations per EPA regulations.

14.0 SIGN REMOVAL AND REPLACEMENT

The CONTRACTOR shall be responsible for removing and replacing all existing signs that are in the way of the Project construction. The existing sign location and height shall be indexed before removal. Removed signs shall be properly and adequately stored. When replaced, signs shall be in existing or better condition, in all respects, than before removal. The CONTRACTOR shall replace any signs that are damaged due to negligence, mishandling, or inadequate storage.

15.0 PROTECTING THE WORK

The CONTRACTOR shall be responsible for protecting all portions of the Work against any and all damage including but not limited to: vandalism, accidents and weather conditions, until accepted. No additional payment will be allowed for rebuilding any portion of the Project caused by such damage.

16.0 FENCING

The CONTRACTOR shall be responsible for removing and rebuilding any and all existing fencing that is damaged or is in the way of the Project construction. This Work shall be considered incidental to the Project and no payment will be allowed for this Work.

17.0 EXISTING WATER VALVE BOXES

The CONTRACTOR shall reference the location of all existing water valve boxes within the construction areas. Any valve boxes that are damaged during construction shall be replaced with no addition Payment. After the new PMPB has been installed and approved, the CONTRACTOR shall neatly saw-cut a two (2) foot by two (2) foot square opening in the new pavement, centered on the valve, and the CONTRACTOR shall install a new reinforced concrete collar, as provided in the Contract Documents.

18.0 EXISTING MANHOLES

The CONTRACTOR shall reference the location and carefully remove and store manhole rings and lids within the construction areas. Any manhole rings and lids damaged shall be replaced by the CONTRACTOR. The top portion of the manhole shall be removed to a depth below the limits of Work, and a steel plate covering over the manhole shall be provided. After the new PMBP has been installed and approved, the CONTRACTOR shall neatly saw cut a four (4) foot by four (4) foot square opening in the new pavement, centered on the manhole.

The CONTRACTOR shall provide concrete adjustment rings as required to reconstruct the top of the manhole to the proper elevation so that the manhole frame and lid are flush with the new PMBP surface. Each manhole shall receive a new reinforced concrete collar, as provided in the Contract Documents.

19.0 WATER SHUT-OFFS

All water shut-offs shall be done by the City. The CONTRACTOR shall notify the City Water Shop forty-eight (48) hours prior to the time of the required shut-off. The CONTRACTOR shall also notify, at least twenty-four (24) hours in advance, each household, office, business and/or other affected water user that a shut-off will be made.

END OF ARTICLE 01-002.1

Article 01-002.2 TRAFFIC CONTROL AND MANAGEMENT

1.0 DESCRIPTION

This Work shall consist of providing Traffic Control and Traffic Control management in accordance with the Contract and the Manual on Uniform Traffic Control Devices (MUTCD), current edition, including supervision of personnel and the installation, inspection, and maintenance of all traffic control devices on the Project.

Complex traffic control Plans shall be development and stamped by a registered professional Engineer prior to submittal to the Project Manager;

2.0 REQUIREMENTS

The Contractor may assign more than one (1) traffic control supervisor (TCS) to provide traffic control management for the Project provided that a schedule is submitted to the ENGINEER and PROJECT MANAGER.

If assigning more than one (1) TCS to provide traffic control management, submit to the Project Manager a weekly schedule identifying who shall be in charge of providing traffic control management each Day.

The TCS shall possess, at all times, a set of APPROVED traffic control plans and a current copy of the MUTCD.

Traffic Control shall be required when construction interferes with thoroughfare traffic. Traffic Control shall also be required to prevent through-traffic, where new development meets existing streets, until all utilities, new streets, and infrastructure have been completed.

Where more than one contractor is working in an area requiring Traffic Control, the CONTRACTOR shall coordinate all Traffic Control operations.

If the CONTRACTOR is using a subcontractor to provide traffic control management, the CONTRACTOR shall ensure that the TCS is in accordance with the Contract.

The Contractor may assign one (1) or more traffic control technician (TCT) to assist the TCS in inspection and maintenance of traffic control devices.

2.1 CERTIFICATION

Before commencing Work that requires traffic control management, submit to the Project Manager a copy of the "Work Zone Safety Supervisor" certificate for the TCS (wallet size card) issued by the American Traffic Safety Services Association (ATSSA), the Associated Contractors of New Mexico (ACNM), or an agency or firm approved by the Department.

The Department will accept the TCS certification by ATSSA, ACNM, or any agency or firm only if the following requirements are met:

1. Successful completion of a Department-approved Work-zone traffic control course;

2. Passing a written examination on a Work-zone traffic control course;
3. At least one (1) year of full-time field experience, verified by the agency or firm, in Work zone traffic control; the Department may verify the experience at its discretion.

The TCT must only satisfy requirements 1 and 2, above.

Before commencing Work that requires flagger traffic control, submit a copy of the "Flagger Training" certificate (wallet sized card) issued by ATSSA, ACNM, FHWA, or an agency or firm approved by the Department.

2.2 RE-CERTIFICATION

Renew the TCS's certification every four (4) years through the ATSSA, ACNM, or a Department-approved agency or firm.

Re-certify in the fourth year, before the expiration date of the current certification.

Flaggers must obtain refresher training which meets the requirements of ATSSA, ACNM, FHWA, or agency or firm approved by the Department prior to the fourth anniversary date shown on the current certificate.

2.3 DUTIES

The TCS's only responsibility is traffic control management. The ENGINEER and/or OWNER may allow exceptions to this rule if the Project is small and requires limited traffic control. The Project Manager and the City Engineer will determine approval of the exception at the preconstruction conference.

The TCS's primary duties include the following:

1. Providing management and supervision services at the Project site;
2. Preparing revisions requested by the Contractor to the traffic control plan in the Contract and submitting the new traffic control plan, in CAD format or hand drafted on a 12 inch x 18 inch piece of 20-pound paper using current drafting standards, to the Project Manager for approval. Complex traffic control Plans shall be development and stamped by a registered professional Engineer prior to submittal to the Project Manager;
3. Coordinating the flagging and signing personnel training;
4. Supervising the flagging and signing personnel;
5. Coordinating traffic control operations for the duration of the Contract, including those of Subcontractors, utility companies, and Suppliers, to ensure that traffic control is in place and fully operational before the commencement of Work. When dealing with utility companies, the TCS shall coordinate concurrent utility traffic control with other construction traffic control to avoid conflicts;

6. Coordinating, in writing, Project activities with the appropriate individual traffic control, law enforcement, and fire control agencies;
7. Preparing and submitting statements concerning Road closures, Delays, and other Project activities to the news media, as necessary. Before submittal to the news media, the Contractor shall submit news releases to the Project Manager for review and approval;
8. Notifying the Project Manager of accidents related to the Project traffic control;
9. Recording time and date of accident notification in accordance with Section 2.4, "TRAFFIC CONTROL DIARY".
10. Attending the preconstruction conference;
11. Maintaining, cleaning, and replacing traffic control devices in use per the current traffic control plan during working and non-working hours

The TCS(s) shall provide management and supervision services at the Project site.

The City recognizes that the CONTRACTOR does not have direct control over the Traffic Control operations of the utility companies. The coordination provided by the TCS when dealing with utility companies is for the purpose of coordinating concurrent utility Traffic Control with any other construction Traffic Control to avoid conflicts.

The TCS(s) shall coordinate all Project activities with the appropriate individual Traffic Control law enforcement, fire control agencies and emergency service providers (Police, Fire and Ambulance).

The TCS(s) shall prepare and submit statements concerning road closures, delays, and other Project activities to the news media, as necessary. News releases shall be submitted to the ENGINEER and/or OWNER for review and approval prior to the CONTRACTOR's submittal to the news media.

The TCS(s) shall be responsible for notifying the ENGINEER of all accidents related to the Project. The time and date of any accidents shall be documented, as well as any other pertinent information.

2.4 TRAFFIC CONTROL DIARY

The TCS shall maintain a Project traffic control diary in a bound book. Obtain the diary from the ACNM.

The TCS shall keep the traffic control diary current each Day and sign each daily entry.

The TCS shall make entries in ink, in a format approved by the Project Manager, without erasures or white-outs. The TCS shall strike out unacceptable entries and replace with acceptable ones. The TCS may use photographs to supplement the written text.

Ensure that the traffic control diary is available for inspection by the Project Manager at all times and submit a copy of the diary to the Project Manager at the end of each week. The traffic control diary shall be keep on site during construction activities.

The traffic control diary will become the property of the Department at the completion of the Project. If the Contractor fails to submit the diary, the Department may withhold final payment until it is submitted.

2.5 INSPECTION OF TRAFFIC CONTROL

The TCS shall inspect traffic control devices every Day that traffic control devices are in use at least once a week during nighttime periods. The TCS shall provide for the immediate cleaning, repair, or replacement of traffic control devices that are not functioning as required to ensure the safety of the motorists and construction personnel.

The TCS shall conduct inspections of the traffic control devices at the beginning and end of each Day that traffic control devices are in use, and as scheduled or directed by the Project Manager during the Work Day.

The TCS shall inspect the traffic control devices during working and non-working hours on a schedule approved in writing by the Project Manager.

The TCT shall inspect Traffic Control devices and shall provide for the immediate repair, cleaning, or replacement of Traffic Control devices not functioning as required or not meeting MUTCD Standards to ensure the safety of the public and construction personnel.

2.6 AVAILABILITY OF TCS

Provide traffic control management under the supervision and direction of the TCS on a 24-hour-per-day basis throughout the duration of the Project.

The TCS shall be on the Project whenever Work is in progress, and available by telephone to be on the Project within 1 hour at all other times.

The provisions for availability of the TCS will also apply during times of Partial or full Project Suspension.

3.0 COMPLIANCE

3.1 FAILURE TO COMPLY

If the Contractor fails to comply with the approved traffic control plan or fails to immediately correct unsafe traffic conditions after written notification of the problem, the Project Manager may suspend all or part of the Contractor's operations.

In the event that the Contractor does not take appropriate action to bring the deficient Traffic Control into compliance with the approved Traffic Control Plan – or to correct the unsafe traffic conditions – the City may proceed with the corrective action and charge the Contractor for the additional cost incurred

If the Department suspends the Contractor's operations, the Department will include the period necessary to correct these unsafe conditions and traffic control deficiencies in the normal assessment of Contract Time.

The Department will not relieve the Contractor of the responsibility to provide traffic control safety to the traveling public, if the Department fully or Partially Suspends the Project.

If the Department suspends the Project due to the Contractor's failure to comply with this Section, or the Contract is in liquidated damages, the Contractor shall continue to provide traffic control management, at no additional cost to the Department.

If the Contractor requests full or Partial Suspensions, the Contractor shall perform the additional traffic control management at no additional cost to the Department.

3.2 ENGINEER MODIFICATION

The provisions included in the Plans and Specifications for handling and controlling traffic during construction may be changed by the ENGINEER due to actual field conditions encountered. Such changes will be made by written instruction to the CONTRACTOR and shall be considered an amendment to the Plans and Specifications as of the date of change.

4.0 METHOD OF MEASUREMENT (REFER TO SECTION 3, BID SCHEDULE FOR MEASUREMENT)

Traffic Control shall be measured by the Lump Sum. A Lump Sum Breakdown shall be provided to the ENGINEER at the Pre-construction Conference.

No separate measure shall be made for Traffic Control. Traffic Control shall be incidental to the project.

5.0 BASIS OF PAYMENT (REFER TO SECTION 3, BID SCHEDULE FOR PAYMENT)

Payment for accepted Traffic Control shall be paid for by the Lump Sum. A Lump Sum Breakdown shall be provided to the ENGINEER at the Pre-construction Conference.

No separate payment will be made for Traffic Control. Payment for Traffic Control shall be made under the item with which it is associated.

The Department will negotiate payment for additional traffic control management resulting from an increase in Work beyond the scope of the Project. Do not start Work until agreement on payment for additional Traffic Control Management.

For normal increases in Contract Items resulting in extensions of the Contract Time, the Department will increase the original Lump sum amount based on the ratio of actual additional Days used to the original Contract Time.

END of ARTICLE 01-002.2

Article 01-002.3 CLEANUP

1.0 DESCRIPTION

This Work shall consist of cleanup, in accordance with this Specification, the Project Plans, and all applicable specification items in these documents. CONTRACTOR shall furnish all the labor, equipment and materials necessary to perform all of the Work required.

2.0 PROJECT CLEANUP

Cleanup of debris, trash and waste materials shall be performed on a continuous basis by the CONTRACTOR in such a way that will keep the work site(s) clean and neat at all times.

The CONTRACTOR shall be responsible for cleaning up the Project. All areas disturbed shall be left in excellent condition, free of any debris, trash, and the like. All trees that were limbed during construction shall be neatly and properly coated with the approved coating so as to protect the cut face, in accordance with good tree surgery practices.

All areas disturbed shall be graded smooth and shall be free of ruts and uneven places.

All excess materials, trash, dirt and rocks shall be disposed of at an approved site or at a place approved by the New Mexico Environment Department.

3.0 FINAL INSPECTION CLEANUP

Immediately before the final inspection tour is to be conducted, the CONTRACTOR shall cleanup the Project site in its entirety, removing all debris, waste, trash, excess materials and equipment. CONTRACTOR shall review the entire Project before the final inspection and shall have it neat and clean in appearance.

4.0 METHOD OF MEASUREMENT (REFER TO SECTION 3, BID SCHEDULE FOR MEASUREMENT)

No separate measure shall be made for Project Cleanup. Project Cleanup shall be considered incidental to the Project Work.

5.0 BASIS OF PAYMENT (REFER TO SECTION 3, BID SCHEDULE FOR PAYMENT)

No separate payment will be made for Project Cleanup. Payment for Project Cleanup shall be considered incidental to the Project Work.

END OF ARTICLE 01-002.3

APPENDIX A

NMDOT Standard Specification 411: Hot-Poured Crack Sealant,
2014 Edition

Section 411: HOT-POURED CRACK SEALANT

411.1 DESCRIPTION

This Work consists of preparing and cleaning cracks and joints in the existing Roadway surface and sealing these cracks with hot-poured sealant.

411.2 MATERIALS

For crack and joint seals, use hot-poured sealant in accordance with the general and physical requirements of ASTM D 6690, as specified in the Contract.

The Contractor shall have the Supplier sample and test the sealant in accordance with ASTM D 6690 and provide certified test results for each lot or batch of sealant supplied. Provide sealant packaged in containers and labeled in accordance with ASTM D 6690. Bulk shipments of sealant must be accompanied by documents that state the following:

1. Manufacturer's name;
2. Trade name of the sealant;
3. Batch or lot number;
4. Pouring temperature; and
5. Safe heating temperature.

Do not mix more than one (1) lot or batch within a bulk shipment of sealant.

411.3 CONSTRUCTION REQUIREMENTS

411.3.1 Temperature and Weather Limitations

Apply the sealant in the following conditions:

1. When the air temperature is at least 40 °F and rising; and
2. When the temperature of the existing pavement surface is above 32 °F during application.

Do not place the sealant during inclement weather, on wet surfaces, or when the wind conditions prevent satisfactory sealing.

411.3.2 Equipment

Provide router bits of at least 1/2-inch diameter that cut to one (1) inch deep.

Use air compressors that provide uncontaminated air at a pressure capable of cleaning approved cracks. Equip air compressors with traps to prevent oil and moisture from entering the air stream.

The Equipment for heating and preparing the sealant mixture shall provide a continuous supply of the prepared mixture and maintain a continuous, uniform and homogeneous mixture during the sealing operation. Provide continuous mechanical agitation as necessary to maintain homogeneity.

Use application devices that provide uniform application of the sealant Materials without clogging, or causing other irregularities in distribution. Application devices and Equipment shall meet the requirements of the sealant manufacturer.

411.3.3 Preparation of Cracks

Route and clean cracks to the satisfaction of the Project Manager.

Route cracks with an average clear opening less than 1/2 inch to provide a minimum sealant reservoir of 1/2 inch wide and to a depth of from 3/4 inch to one (1) inch, unless

otherwise directed by the Project Manager. Center routers over the cracks during routing operations.

Clean cracks with an average clear opening 1/2 inch or greater with high-velocity compressed air to a depth of from 3/4 inch to one (1) inch, unless otherwise directed by the Project Manager.

Immediately before placing the sealant, clean loose particles, dust, and other Deleterious Materials from the sealant reservoirs with high-velocity compressed air.

411.3.4 Application of Sealant

Control the application to confine sealant within the reservoirs. Apply sealant to the clean, dry-surfaced reservoirs to a depth of from 3/8 inch to 1/4 inch below the existing surface of the Roadway. If the Project Manager determines that the method of filling results in an excessive amount of sealant on the pavement surface, stop filling and change the method. Clean excess sealant Material from the pavement surface.

If application devices clog or irregularities in the application occur, halt operations until corrective action is taken.

Follow special preparation or placement requirements indicated by the manufacturer.

411.3.5 Resumption of Traffic

Cure sealant in accordance with the manufacturer's requirements, before placing traffic on the pavement surface.

411.4 METHOD OF MEASUREMENT—Reserved

411.5 BASIS OF PAYMENT

Pay Item

Hot-Poured Crack Sealing

| PRIORITY | STREET | FROM | TO | BID ALTERNATES | Calendar Days |
|----------|----------------|------------------|-------------------|------------------------|---------------|
| 1 | Tres Lagos | Hamilton | Hamilton | | |
| 2 | N. Florida | 2nd St | N Scenic Dr | | |
| 3 | S. Florida | Desert Lakes | Panorama Blvd | | |
| 4 | Hopi Trail | | | | |
| 5 | N. Scenic | Indian Wells | NMSU-A | Base Bid | 80 |
| 6 | 18th St | Washington Av | N. Scenic | | |
| 7 | 15th St | College | N. Scenic | | |
| 8 | College | 10th St | Indian Wells Blvd | | |
| 9 | 1st St | White Sands Blvd | N Scenic Dr | Bid Alternate 2 | 10 |
| 10 | Fairgrounds Rd | White Sands Blvd | N. Florida | Bid Alternate 3 | 5 |
| 11 | N. Scenic | NMSU-A | N. Florida | Bid Alternate 4 | 14 |
| 12 | Abbott | Bellamah | N. Scenic | | |
| 13 | Caneadea Lp | S. Florida | S. Florida | | |
| 14 | Cameo | Caneadea | Caneadea | | |
| 15 | Las Lomas | Caneadea | Ocotillo | | |
| | | | | Bid Alternate 5 | 10 |

NOTES:

1. Contractor's equipment and material can be stored and staged at the Public Works Yard at 2600 N. Florida Ave
2. Contractor can place the routing millings in a stockpile at the Public Works Yard at 2600 N. Florida Ave.
3. Contractor shall coordinate with Public Works Inspector
4. Estimated quantity of crack seal material for entire list of streets (base bid and all alternates) is 145,000 pounds. Contractor to verify.
5. Cracks with existing sealant will only need to be blown out and re-sealed. No weed killing or grass removal will be done by the city in advance of the project.
6. No road striping will be required.
7. Upon Award, Contractor may request work delay to Spring for warmer temperatures. Approval will be at the discretion of the City.

