

JOB SPECIAL PROVISIONS TABLE OF CONTENTS (ROADWAY)

(Job Special Provisions shall prevail over General Special Provisions whenever in conflict therewith.)

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Job No.: J7S3293B J7S3346

Route: A & K 38

County: Webster Webster

|                                                                                                         |                                                                                                                                       |
|---------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------|
|                                                                                                         | <b>MISSOURI HIGHWAYS AND<br/>TRANSPORTATION COMMISSION</b><br>105 W. CAPITOL AVE.<br>JEFFERSON CITY, MO 65102<br>Phone 1-888-275-6636 |
|                                                                                                         | If a seal is present on this sheet,<br>JSP's have been electronically sealed<br>and dated.                                            |
|                                                                                                         | JOB NUMBER: J7S3293B, J7S3346<br>WEBSTER COUNTY, MO<br>DATE PREPARED: August 21, 2021                                                 |
|                                                                                                         | ADDENDUM DATE:                                                                                                                        |
| Only the following items of the Job Special Provisions (Roadway) are<br>authenticated by this seal: All |                                                                                                                                       |

JOB  
SPECIAL PROVISION

A. General - Federal JSP-09-02G

**1.0 Description.** The Federal Government is participating in the cost of construction of this project. All applicable Federal laws, and the regulations made pursuant to such laws, shall be observed by the contractor, and the work will be subject to the inspection of the appropriate Federal Agency in the same manner as provided in Sec 105.10 of the Missouri Standard Specifications for Highway Construction with all revisions applicable to this bid and contract.

**1.1** This contract requires payment of the prevailing hourly rate of wages for each craft or type of work required to execute the contract as determined by the Missouri Department of Labor and Industrial Relations and requires adherence to a schedule of minimum wages as determined by the United States Department of Labor. For work performed anywhere on this project, the contractor and the contractor's subcontractors shall pay the higher of these two applicable wage rates. State Wage Rates, Information on the Required Federal Aid Provisions, and the current Federal Wage Rates are available on the Missouri Department of Transportation web page at [www.modot.org](http://www.modot.org) under "Doing Business with MoDOT", "Contractor Resources". Effective Wage Rates will be posted 10 days prior to the applicable bid opening. These supplemental bidding documents have important legal consequences. It shall be conclusively presumed that they are in the bidder's possession, and they have been reviewed and used by the bidder in the preparation of any bid submitted on this project.

**1.2** The following documents are available on the Missouri Department of Transportation web page at [www.modot.org](http://www.modot.org) under "Doing Business with MoDOT"; "Standards and Specifications". The effective version shall be determined by the letting date of the project.

General Provisions & Supplemental Specifications

Supplemental Plans to July 2021 Missouri Standard Plans  
For Highway Construction

These supplemental bidding documents contain all current revisions to the published versions and have important legal consequences. It shall be conclusively presumed that they are in the bidder's possession, and they have been reviewed and used by the bidder in the preparation of any bid submitted on this project.

B. Contract Liquidated Damages JSP-13-01B

**1.0 Description.** Liquidated Damages for failure or delay in completing the work on time for this contract shall be in accordance with Sec 108.8. The liquidated damages include separate amounts for road user costs and contract administrative costs incurred by the Commission.

**2.0 Period of Performance.** Prosecution of work is expected to begin on the date specified below in accordance with Sec 108.2. Regardless of when the work is begun on this contract, all work shall be completed on or before the date specified below. Completion by this date shall be in accordance with the requirements of Sec 108.7.1.

Job No.: J7S3293B J7S3346  
Route: A & K 38  
County: Webster Webster

Notice to Proceed: January 3, 2022  
Completion Date: November 1, 2022

**2.1 Calendar Days.** The count of calendar days will begin on the date the contractor starts any construction operations on the project.

| Job Number | Calendar Days | Daily Road User Cost |
|------------|---------------|----------------------|
| J7S3293B   | 104           | \$2,300              |
| J7S3346    | 68            | \$3,200              |

**3.0 Liquidated Damages for Contract Administrative Costs.** Should the contractor fail to complete the work on or before the completion date specified in Section 2.0, or within the number of calendar days specified in Section 2.1, whichever occurs first, the contractor will be charged contract administrative liquidated damages in accordance with Sec 108.8 in the amount of **\$1,500** per calendar day for each calendar day, or partial day thereof, that the work is not fully completed. For projects in combination, these damages will be charged in full for failure to complete one or more projects within the above specified completion date or calendar days.

**4.0 Liquidated Damages for Road User Costs.** Should the contractor fail to complete the work on or before the completion date specified in Section 2.0, or within the number of calendar days specified in Section 2.1, whichever occurs first, the contractor will be charged road user costs in accordance with Sec 108.8 in the amount specified in Section 2.1 for each calendar day, or partial day thereof, that the work is not fully completed. These damages are in addition to the contract administrative damages and any other damages as specified elsewhere in this contract.

C. Work Zone Traffic Management JSP-02-06J

**1.0 Description.** Work zone traffic management shall be in accordance with applicable portions of Division 100 and Division 600 of the Standard Specifications, and specifically as follows.

**1.1 Maintaining Work Zones and Work Zone Reviews.** The Work Zone Specialist (WZS) shall maintain work zones in accordance with Sec 616.3.3 and as further stated herein. The WZS shall coordinate and implement any changes approved by the engineer. The WZS shall ensure all traffic control devices are maintained in accordance with Sec 616, the work zone is operated within the hours specified by the engineer, and will not deviate from the specified hours without prior approval of the engineer. The WZS is responsible to manage work zone delay in accordance with these project provisions. When requested by the engineer, the WZS shall submit a weekly report that includes a review of work zone operations for the week. The report shall identify any problems encountered and corrective actions taken. Work zones are subject to unannounced inspections by the engineer and other departmental staff to corroborate the validity of the WZS's review and may require immediate corrective measures and/or additional work zone monitoring.

**1.2 Work Zone Deficiencies.** Failure to make corrections on time may result in the engineer suspending work. The suspension will be non-excusable and non-compensable regardless if road user costs are being charged for closures.

**2.0 Traffic Management Schedule.**

**2.1** Traffic management schedules shall be submitted to the engineer for review prior to the start of work and prior to any revisions to the traffic management schedule. The traffic management schedule shall include the proposed traffic control measures, the hours traffic control will be in place, and work hours.

**2.2** The traffic management schedule shall conform to the limitations specified in Sec 616 regarding lane closures, traffic shifts, road closures and other width, height and weight restrictions.

**2.3** The engineer shall be notified as soon as practical of any postponement due to weather, material or other circumstances.

**2.4** In order to ensure minimal traffic interference, the contractor shall schedule lane closures for the absolute minimum amount of time required to complete the work. Lanes shall not be closed until material is available for continuous construction and the contractor is prepared to diligently pursue the work until the closed lane is opened to traffic.

**2.5 Traffic Congestion.** The contractor shall, upon approval of the engineer, take proactive measures to reduce traffic congestion in the work zone. The contractor shall immediately implement appropriate mitigation strategies whenever traffic congestion reaches an excess of 10 minutes to prevent congestion from escalating to 15 minute or above threshold. If disruption of the traffic flow occurs and traffic is backed up in queues of 15 minute delays or longer, then the contractor shall immediately review the construction operations which contributed directly to disruption of the traffic flow and make adjustments to the operations to prevent the queues from reoccurring. Traffic delays may be monitored by physical presence on site or by utilizing real-time travel data through the work zone that generate text and/or email notifications where available. The engineer monitoring the work zone may also notify the contractor of delays that require prompt mitigation. The contractor may work with the engineer to determine what other alternative solutions or time periods would be acceptable.

#### **2.5.1 Traffic Safety.**

**2.5.1.1 Recurring Congestion.** Where traffic queues routinely extend to within 1000 feet of the ROAD WORK AHEAD, or similar, sign on a divided highway or to within 500 feet of the ROAD WORK AHEAD, or similar, sign on an undivided highway, the contractor shall extend the advance warning area, as approved by the engineer.

**2.5.1.2 Non-Recurring Congestion.** When traffic queues extend to within 1000 feet of the ROAD WORK AHEAD, or similar, sign on a divided highway or to within 500 feet of the ROAD WORK AHEAD, or similar, sign on an undivided highway infrequently, the contractor shall deploy a means of providing advance warning of the traffic congestion, as approved by the engineer. The warning location shall be no less than 1000 feet and no more than 0.5 mile in advance of the end of the traffic queue on divided highways and no less than 500 feet and no more than 0.5 mile in advance of the end of the traffic queue on undivided highways.

#### **3.0 Work Hour Restrictions.**

**3.1** Except for emergency work, as determined by the engineer, and long term lane closures required by project phasing, all lanes shall be scheduled to be open to traffic during the five major holiday periods shown below, from 12:00 noon on the last working day preceding the

holiday until 6:00 a.m. on the first working day subsequent to the holiday unless otherwise approved by the engineer.

Memorial Day  
Labor Day  
Thanksgiving  
Christmas  
New Year's Day

**3.1.1 Independence Day.** The lane restrictions specified in Section 3.1 shall also apply to Independence Day, except that the restricted periods shall be as follows:

12:00 noon July 2, 2021 – 6:00 a.m. July 6, 2021  
12:00 noon July 1, 2022 – 6:00 a.m. July 5, 2022  
12:00 noon June 30, 2023 – 6:00 a.m. July 5, 2023

**3.2** The contractor shall not perform any construction operation on the roadway, including the hauling of material within the project limit during restricted periods, holiday periods or other special events specified in the contract documents.

**3.3** The contractor shall be aware that traffic volume data indicates construction operations on the roadbed between 5:00 a.m. and 9:00 p.m. for Project J7S3346 will likely result in traffic queues greater than 15 minutes. Based on this, the contractor's operations will be restricted accordingly unless it can be successfully demonstrated the operations can be performed without a 15 minute queue in traffic. It shall be the responsibility of the engineer to determine if the above work hours may be modified. Working hours for evenings, weekends and holidays will be determined by the engineer.

**3.4** Any work requiring a reduction in the number of through lanes of traffic shall be completed during nighttime hours. Nighttime hours shall be considered to be 9:00 p.m. to 5:00 a.m. for project J7S3346.

#### **4.0 Detours and Lane Closures.**

**4.1** When a changeable message sign (CMS) is provided, the contractor shall use the CMS to notify motorists of future traffic disruption and possible traffic delays one week before traffic is shifted to a detour or prior to lane closures. The CMS shall be installed at a location as approved or directed by the engineer. The CMS shall be capable of communication with the Transportation Management Center (TMC), if applicable, prior to installation on right of way. All messages planned for use in the work zone shall be approved and authorized by the engineer or its designee prior to deployment. When permanent dynamic message signs (DMS) owned and operated by MoDOT are located near the project, they may also be used to provide warning and information for the work zone. Permanent DMS shall be operated by the TMC, and any messages planned for use on DMS shall be approved and authorized by the TMC at least 72 hours in advance of the work.

**5.0 Basis of Payment.** No direct payment will be made to the contractor to recover the cost of equipment, labor, materials, or time required to fulfill the above provisions, unless specified elsewhere in the contract document. All authorized changes in the traffic control plan shall be provided for as specified in Sec 616.

**D. Emergency Provisions and Incident Management JSP-90-11A**

**1.0** The contractor shall have communication equipment on the construction site or immediate access to other communication systems to request assistance from law enforcement or other emergency agencies for incident management. In case of traffic accidents or the need for law enforcement to direct or restore traffic flow through the job site, the contractor shall notify law enforcement or other emergency agencies immediately as needed. The area engineer's office shall also be notified when the contractor requests emergency assistance.

**2.0** In addition to the 911 emergency telephone number for ambulance, fire or law enforcement services, the following agencies may also be notified for accident or emergency situation within the project limits.

|                                                                                        |                      |
|----------------------------------------------------------------------------------------|----------------------|
| Missouri Highway Patrol 417-895-6868                                                   |                      |
| MoDOT Customer Service: 417-895-7600                                                   |                      |
| Webster County Sheriff Department: 417-859-2247                                        |                      |
| Webster County Fire Department: 417-859-3911                                           |                      |
| Douglas County Sheriff Department: 417-683-1020                                        |                      |
| Douglas County Fire Department: 417-683-1020                                           |                      |
| City of Marshfield                                                                     | City of Seymour      |
| Fire: 417-859-0884                                                                     | Fire: 417-935-2822   |
| Police: 417-859-5325                                                                   | Police: 417-935-4012 |
| Emergency Only Numbers                                                                 |                      |
| (*55 cell phone – Missouri Highway Patrol)<br>(417-864-1160 – MoDOT Incident Response) |                      |

**2.1** This list is not all inclusive. Notification of the need for wrecker or tow truck services will remain the responsibility of the appropriate law enforcement agency.

**2.2** The contractor shall notify law enforcement and emergency agencies before the start of construction to request their cooperation and to provide coordination of services when emergencies arise during the construction at the project site. When the contractor completes this notification with law enforcement and emergency agencies, a report shall be furnished to the engineer on the status of incident management.

**3.0** No direct pay will be made to the contractor to recover the cost of the communication equipment, labor, materials, or time required to fulfill the above provisions.

**E. Project Contact for Contractor/Bidder Questions JSP-96-05**

All questions concerning this project during the bidding process shall be forwarded to the project contact listed below.

Job No.: J7S3293B J7S3346  
Route: A & K 38  
County: Webster Webster

Warner "Bud" Sherman, PE, Project Contact  
Transportation Project Manager  
Southwest District  
3025 E. Kearney Street  
Springfield, MO 65803  
Telephone Number: 417-895-7690  
Email: [Warner.Sherman@modot.mo.gov](mailto:Warner.Sherman@modot.mo.gov)

All questions concerning the bid document preparation can be directed to the Central Office – Design at (573) 751-2876.

F. Supplemental Revisions JSP-18-01R

Compliance with [2 CFR 200.216 – Prohibition on Certain Telecommunications and Video Surveillance Services or Equipment](#).

The Missouri Highways and Transportation Commission shall not enter into a contract (or extend or renew a contract) using federal funds to procure or obtain equipment, services, or systems that uses covered telecommunications equipment or services as substantial or as critical technology as part of any system where the video surveillance and telecommunications equipment was produced by Huawei Technologies Company, ZTE Corporation, Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, or Dahua Technology Company (or any subsidiary or affiliate of such entities).

Stormwater Compliance Requirements

**1.0 Description.** This provision requires the contractor to provide a Water Pollution Control Manager (WPCM) for any project that includes land disturbance on the project site and the total area of land disturbance, both on the project site, and all Off-site support areas, is one (1) acre or more. Regardless of the area of Off-site disturbance, if no land disturbance occurs on the project site, these provisions do not apply. When a WPCM is required, all sections within this provision shall be applicable, including assessment of specified Liquidated Damages for failure to correct Stormwater Deficiencies, as specified herein. This provision is in addition to any other stormwater, environmental, and land disturbance requirements specified elsewhere in the contract.

**1.1 Definitions.** The project site is defined as all areas designated on the plans, including temporary and permanent easements. The project site is equivalent to the "permitted site", as defined in MoDOT's State Operating Permit. An Off-site area is defined as any location off the project site the contractor utilizes for a dedicated project support function, such as, but not limited to, staging area, plant site, borrow area, or waste area.

**1.2 Reporting of Off-Site Land Disturbance.** If the project includes any planned land disturbance on the project site, prior to the start of work, the contractor shall submit a written report to the engineer that discloses all Off-site support areas where land disturbance is planned, the total acreage of anticipated land disturbance on those sites, and the land disturbance permit number(s). Upon request by the engineer, the contractor shall submit a copy of its land disturbance permit(s) for Off-site locations. Based on the total acreage of land disturbance, both on and Off-site, the engineer shall determine if these Stormwater Compliance

Requirements shall apply. The Contractor shall immediately report any changes to the planned area of Off-site land disturbance. The Contractor is responsible for obtaining its own separate land disturbance permit for Off-site areas.

**2.0 Water Pollution Control Manager (WPCM).** The Contractor shall designate a competent person to serve as the Water Pollution Control Manager (WPCM) for projects meeting the description in Section 1.0. The Contractor shall ensure the WPCM completes all duties listed in Section 2.1.

**2.1 Duties of the WPCM:**

- (a) Be familiar with the stormwater requirements including the current MoDOT State Operating Permit for construction stormwater discharges/land disturbance activities; MoDOT's statewide Stormwater Pollution Prevention Plan (SWPPP); the Corps of Engineers Section 404 Permit, when applicable; the project specific SWPPP, the Project's Erosion & Sediment Control Plan; all applicable special provisions, specifications, and standard drawings; and this provision;
- (b) Successfully complete the MoDOT Stormwater Training Course within the last 4 years. The MoDOT Stormwater Training is a free online course available at MoDOT.org;
- (c) Attend the Pre-Activity Meeting for Grading and Land Disturbance and all subsequent Weekly Meetings in which grading activities are discussed;
- (d) Oversee and ensure all work is performed in accordance with the Project-specific SWPPP and all updates thereto, or as designated by the Engineer;
- (e) Review the project site for compliance with the Project SWPPP, as needed, from the start of any grading operations until final stabilization is achieved, and take necessary actions to correct any known deficiencies to prevent pollution of the waters of the state or adjacent property owners prior to the engineer's weekly inspections;
- (f) Review and acknowledge receipt of each MoDOT Inspection Report (Land Disturbance Inspection Record) for the Project within forty eight (48) hours of receiving the report and ensure that all Stormwater Deficiencies noted on the report are corrected as soon as possible, but no later than stated in Section 5.0.

**3.0 Pre-Activity Meeting for Grading/Land Disturbance and Required Hold Point.** A Pre-Activity meeting for grading/land disturbance shall be held prior to the start of any land disturbance operations. No land disturbance operations shall commence prior to the Pre-Activity meeting except work necessary to install perimeter controls and entrances. Discussion items at the pre-activity meeting shall include a review of the Project SWPPP, the planned order of grading operations, proposed areas of initial disturbance, identification of all necessary BMPs that shall be installed prior to commencement of grading operations, and any issues relating to compliance with the Stormwater requirements that could arise in the course of construction activity at the project.

**3.1 Hold Point.** Following the pre-activity meeting for grading/land disturbance and subsequent installation of the initial BMPs identified at the pre-activity meeting, a Hold Point shall occur prior to the start of any land disturbance operations to allow the engineer and WPCM the time needed to perform an on-site review of the installation of the BMPs to ensure

compliance with the SWPPP is met. Land disturbance operations shall not begin until authorization is given by the engineer.

**4.0 Inspection Reports.** Weekly and post run-off inspections will be performed by the engineer and each Inspection Report (Land Disturbance Inspection Record) will be entered into a web-based Stormwater Compliance database. The WPCM will be granted access to this database and shall promptly review all reports, including any noted deficiencies, and shall acknowledge receipt of the report as required in Section 2.1 (f.).

**5.0 Stormwater Deficiency Corrections.** All stormwater deficiencies identified in the Inspection Report shall be corrected by the contractor within 7 days of the inspection date or any extended period granted by the engineer when weather or field conditions prohibit the corrective work. If the contractor does not initiate corrective measures within 5 calendar days of the inspection date or any extended period granted by the engineer, all work shall cease on the project except for work to correct these deficiencies, unless otherwise allowed by the engineer. All impact costs related to this halting of work, including, but not limited to stand-by time for equipment, shall be borne by the Contractor. Work shall not resume until the engineer approves the corrective work.

**5.1 Liquidated Damages.** If the Contractor fails to complete the correction of all Stormwater Deficiencies listed on the MoDOT Inspection Report within the specified time limit, the Commission will be damaged in various ways, including but not limited to, potential liability, required mitigation, environmental clean-up, fines and penalties. These damages are not reasonably capable of being computed or quantified. Therefore, the contractor will be charged with liquidated damages specified in the amount of \$2,000 per day for failure to correct one or more of the Stormwater Deficiencies listed on the Inspection Report within the specified time limit. In addition to the stipulated damages, the stoppage of work shall remain in effect until all corrections are complete.

**6.0 Basis of Payment.** No direct payment will be made for compliance with this provision.

## COVID-19 Safety

**1.0 Description.** The coronavirus disease 2019 or COVID-19 has reached a pandemic stage across the United States, including the State of Missouri. To reduce the impact of COVID-19 outbreak conditions on businesses, workers, customers and the public, the contractor shall be aware of all COVID-19 guidance from the Center for Disease Control (CDC) and other government health mandates. The contractor shall conduct all operations in conformance with these safety directives. The guidance may change during the project construction and the contractor shall change and adapt their operation and safety protocols accordingly.

**2.0 Safety Plan.** The contractor shall include these procedures in the project safety plan as called for in the contract documents and revise the safety plan as needed.

**3.0 Essential Work.** In accordance with any state or local Stay at Home Order, care for the infrastructure has been deemed essential and MoDOT is moving forward with construction projects, this project is considered essential and the contractor and their employees, subcontractors and suppliers are considered essential business and performing essential functions.

**4.0 Basis of Payment.** Compliance with regulations and laws pertaining to COVID-19 is covered under Sec 107 of the Missouri Standard Specifications for Highway Construction. No direct payment will be made for compliance with this provision.

Anti-Discrimination Against Israel Certification

By signing this contract the Company certifies it is not currently engaged in and shall not, for the duration of the contract, engage in a boycott of goods or services from the State of Israel, companies doing business in or with Israel or authorized by, licensed by, or organized under the laws of the State of Israel, or persons or entities doing business in the State of Israel as defined by Section 34.600 RSMo. This certification shall not apply to contracts with a total potential value of less than One Hundred Thousand Dollars (\$100,000) or to contractors with fewer than ten (10) employees.

G. Utilities JSP-93-26F

**1.0** For informational purposes only, the following is a list of names, addresses, and telephone numbers of the known utility companies in the area of the construction work for this improvement:

**Utility List for Rte. A (J7S3293B)**

| <b><u>Utility Name</u></b>                                                                                                                                                                                             | <b><u>Known Required<br/>Adjustment</u></b> | <b><u>Type</u></b> |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|--------------------|
| CenturyLink -- National<br>Mr. Bobby Kennedy<br>110 E. Hadley St.<br>Republic, MO 65738<br>Phone: 636-887-6273<br>Email: <a href="mailto:bobby.kennedy@centurylink.com">bobby.kennedy@centurylink.com</a>              | None<br>(See section 2.0)                   | Communications     |
| CenturyLink -- Distribution<br>Mr. Garland Jones<br>11109 E. Business 60<br>Mountain Grove, MO 65711<br>Phone: 417-926-0117<br>Email: <a href="mailto:Garland.Jones@centurylink.com">Garland.Jones@centurylink.com</a> | None<br>(See section 3.0)                   | Communications     |
| MediaCom Communications<br>Mr. Kyle Keller<br>1533 S. Enterprise<br>Springfield, MO 65804<br>Phone: 417-496-8577<br>Email: <a href="mailto:kkeller@mediacomcc.com">kkeller@mediacomcc.com</a>                          | None                                        | Communications     |

Job No.: J7S3293B J7S3346  
Route: A & K 38  
County: Webster Webster

|                                                                                                                                                                                                                                       |                           |                |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------|----------------|
| Verizon MCI<br>Bryan Burger<br>10740 Nall Ave., Suite 400<br>Overland Park, KS 66211<br>Phone: 816-204-4494<br>Email: <a href="mailto:bryan.burger@verizon.com">bryan.burger@verizon.com</a>                                          | None<br>(See section 4.0) | Communications |
| City of Marshfield -- Water<br>Mr. Richard Nevills<br>798 S. Marshall St.<br>Marshfield, MO 65706<br>Phone: 417-468-2310<br>Email: <a href="mailto:rnevills@marshfieldmo.gov">rnevills@marshfieldmo.gov</a>                           | None                      | Water          |
| City of Marshfield -- Sewer<br>Mr. John O'Dell<br>798 S. Marshall St.<br>Marshfield, MO 65706<br>Phone: 417-468-2310<br>Email: <a href="mailto:jodell@marshfieldmo.gov">jodell@marshfieldmo.gov</a>                                   | None                      | Sewer          |
| Summit Natural Gas<br>Mr. James Trujillo<br>272 Keystone Industrial Park Dr.<br>Camdenton, MO 65020<br>Phone: 720-981-2123 ext. 1664<br>Email: <a href="mailto:jtrujillo@summitutilitiesinc.com">jtrujillo@summitutilitiesinc.com</a> | None<br>(See section 5.0) | Gas            |

**Utility List for Rte. K (J7S3293B)**

| <b><u>Utility Name</u></b>                                                                                                                                                                                    | <b><u>Known Required<br/>Adjustment</u></b> | <b><u>Type</u></b>     |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|------------------------|
| CenturyLink – National<br>See Contact Information Above                                                                                                                                                       | None                                        | Communications         |
| CenturyLink – Distribution<br>See Contact Information Above                                                                                                                                                   | None                                        | Communications         |
| MediaCom Communications<br>See Contact Information Above                                                                                                                                                      | None                                        | Communications         |
| Summit Natural Gas<br>See Contact Information Above                                                                                                                                                           | None                                        | Gas                    |
| MoDOT – Signals, Lighting, ITS<br>Mr. Joe Dotson<br>2455 N. Mayfair Ave.<br>Springfield, MO 65803<br>Phone: 417-733-0664<br>Email: <a href="mailto:joseph.dotson@modot.mo.gov">joseph.dotson@modot.mo.gov</a> | None                                        | Signals, Lighting, ITS |

Job No.: J7S3293B J7S3346  
Route: A & K 38  
County: Webster Webster

Se-Ma-No Electric Cooperative  
Mr. Eddie Calhoun  
PO Box 318  
Mansfield, MO 65704  
Phone: 417-924-3243  
Email: [ecalhoun@semano.com](mailto:ecalhoun@semano.com)

None

Electric

City of Seymour – Electric, Sewer & Water  
Mr. Mitchell Plummer  
123 W. Market  
Seymour, MO 65746  
Phone: 417-935-4401  
Email: [mitch@seymourmissouri.org](mailto:mitch@seymourmissouri.org)

None

Electric, Sewer, Water

### **Utility List for MO 38 (J7S3346)**

| <b><u>Utility Name</u></b>                                                                                                                                                     | <b><u>Known Required<br/>Adjustment</u></b> | <b><u>Type</u></b>     |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|------------------------|
| CenturyLink – National<br>See Contact Information Above                                                                                                                        | None                                        | Communications         |
| CenturyLink – Distribution<br>See Contact Information Above                                                                                                                    | None                                        | Communications         |
| MediaCom Communications<br>See Contact Information Above                                                                                                                       | None                                        | Communications         |
| MoDOT – Signals, Lighting, ITS<br>See Contact Information Above                                                                                                                | None                                        | Signals, Lighting, ITS |
| Summit Natural Gas<br>See Contact Information Above                                                                                                                            | None                                        | Gas                    |
| City of Marshfield -- Water<br>See Contact Information Above                                                                                                                   | None                                        | Water                  |
| City of Marshfield -- Sewer<br>See Contact Information Above                                                                                                                   | None                                        | Sewer                  |
| AT&T – Distribution<br>Mr. Roger Payne<br>600 St. Louis, Room 630<br>Springfield, MO 65806<br>Phone: 417-836-2507<br>Email: <a href="mailto:rp4629@att.com">rp4629@att.com</a> | None                                        | Communications         |

Job No.: J7S3293B J7S3346  
Route: A & K 38  
County: Webster Webster

|                                                                                                                                                                                          |      |                |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------------|
| Sho-Me Technologies<br>Mr. Brad McGoon<br>301 W. Jackson St.<br>Marshfield, MO 65706<br>Phone: 417-859-3475<br>Email: <a href="mailto:dmcgoon@shomepower.com">dmcgoon@shomepower.com</a> | None | Communications |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------------|

|                                                                                                                                                                                                 |      |          |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------|
| Webster Electric Cooperative<br>Mr. Jeff Hensley<br>120 Vivian Street<br>Marshfield, MO 65706<br>Phone: 417-630-7023<br>Email: <a href="mailto:hensley@websterec.com">hensley@websterec.com</a> | None | Electric |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------|

|                                                                                                                                                                                |      |          |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------|
| Sho-Me Power<br>Mr. James Epperson<br>PO Box D<br>Marshfield, MO 65706<br>Phone: 417-818-2675<br>Email: <a href="mailto:jepperson@shomepower.com">jepperson@shomepower.com</a> | None | Electric |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------|----------|

**1.1** The existence and approximate location of utility facilities known to exist, as shown on the plans, are based upon the best information available to the Commission at this time. This information is provided by the Commission "as-is" and the Commission expressly disclaims any representation or warranty as to the completeness, accuracy, or suitability of the information for any use. Reliance upon this information is done at the risk and peril of the user, and the Commission shall not be liable for any damages that may arise from any error in the information. It is, therefore, the responsibility of the contractor to verify the above listing information indicating existence, location, and status of any facility. Such verification includes direct contact with the listed utilities.

**2.0 CenturyLink – National.** CenturyLink National has a buried 12 count fiber in the same trench as CenturyLink – Distribution running along the east side of Route A in the location of the proposed "Buggy Lane" installations. The contractor shall stake the edge of the proposed "Buggy Lanes" and have CenturyLink – National located prior to the beginning of construction. Bobby Kennedy shall be contacted a minimum of 2 weeks prior to constructing the "Buggy Lanes" to coordinate any possible relocation. Contact information is listed below.

Bobby Kennedy  
(417) 860-4526  
[bobby.kennedy@lumen.com](mailto:bobby.kennedy@lumen.com)

**3.0 CenturyLink – Distribution.** CenturyLink Distribution has a buried copper telecommunications line along with a fiber optic cable varying between 48 and 96 count in the same trench as CenturyLink – National running along the east side of Route A in the location of the proposed "Buggy Lane" installations. The contractor shall stake the edge of the proposed "Buggy Lanes" and have CenturyLink – Distribution located prior to the beginning of construction. Garland Jones shall be contacted a minimum of 2 weeks prior to constructing the "Buggy Lanes" to coordinate any possible relocation. Contact information is listed below.

Garland Jones  
(417) 926-0117  
[garland.jones@lumen.com](mailto:garland.jones@lumen.com)

**4.0 Verizon MCI.** Verizon MCI has a buried fiber optic transmission line encased in a 10" steel pipe crossing Route A at approximate SB LM 1.007. The contractor shall contact the local Verizon MCI field engineers Jeff Miller and Kyle Howerton a minimum of 2 weeks prior to the installation of the 2' shoulder at this location to allow them to be on location at the time of construction. The contractor shall coordinate any relocations with Verizon MCI. Contact information is listed below.

Jeff Miller – [jeff.miller@verizon.com](mailto:jeff.miller@verizon.com)  
Kyle Howerton – [kyle.howerton@verizon.com](mailto:kyle.howerton@verizon.com)

**5.0 Summit Natural Gas.** Summit Natural Gas has a 4" steel gas main that runs along Route A. Summit Natural Gas has requested to be on location any time the contractor is conducting excavation. The contractor shall contact Ray Cass a minimum of 2 weeks prior to the beginning of construction to allow Summit Natural Gas to be on location during any excavation. The contractor shall coordinate any relocations with Summit Natural Gas. Contact information is listed below.

Ray Cass – (417) 991-1318

#### H. Contractor Quality Control NJSP-15-42

**1.0** The contractor shall perform Quality Control (QC) testing in accordance with the specifications and as specified herein. The contractor shall submit a Quality Control Plan (QC Plan) to the engineer for approval that includes all items listed in Section 2.0, prior to beginning work.

#### **2.0 Quality Control Plan.**

- (a) The name and contact information of the person in responsible charge of the QC testing.
- (b) A list of the QC technicians who will perform testing on the project, including the fields in which they are certified to perform testing.
- (c) A proposed independent third party testing firm for dispute resolution, including all contact information.
- (d) A list of Hold Points, when specified by the engineer.
- (e) The MoDOT Standard Inspection and Testing Plan (ITP). This shall be the version that is posted at the time of bid on the MoDOT website ([www.modot.org/quality](http://www.modot.org/quality)).

**3.0 Quality Control Testing and Reporting.** Testing shall be performed per the test method and frequency specified in the ITP. All personnel who perform sampling or testing shall be certified in the MoDOT Technician Certification Program for each test that they perform.

**3.1 Reporting of Test Results.** All QC test reports shall be submitted as soon as practical, but no later than the day following the test. Test data shall be immediately provided to the engineer upon request at any time, including prior to the submission of the test report. No payment will be made for the work performed until acceptable QC test results have been received by the engineer and confirmed by QA test results.

**3.1.1** Test results shall be reported on electronic forms provided by MoDOT. Forms and Contractor Reporting Excel2Oracle Reports (CRE2O) can be found on the MoDOT website. All required forms, reports and material certifications shall be uploaded to a Microsoft SharePoint® site provided by MoDOT, and organized in the file structure established by MoDOT.

**3.2 Non-Conformance Reporting.** A Non-Conformance Report (NCR) shall be submitted by the contractor when the contractor proposes to incorporate material into the work that does not meet the testing requirements or for any work that does not comply with the contract terms or specifications.

**3.2.1** Non-Conformance Reporting shall be submitted electronically on the Non-Conformance Report form provided on the MoDOT Website. The NCR shall be uploaded to the MoDOT SharePoint® site and an email notification sent to the engineer.

**3.2.2** The contractor shall propose a resolution to the non-conforming material or work. Acceptance of a resolution by the engineer is required before closure of the non-conformance report.

#### **4.0 Work Planning and Scheduling.**

**4.1 Two-week Schedule.** Each week, the contractor shall submit to the engineer a schedule that outlines the planned project activities for the following two-week period. The two-week schedule shall detail all work and traffic control events planned for that period and any Hold Points specified by the engineer.

**4.2 Weekly Meeting.** When work is active, the contractor shall hold a weekly project meeting with the engineer to review the planned activities for the following week and to resolve any outstanding issues. Attendees shall include the engineer, the contractor superintendent or project manager and any foreman leading major activities. This meeting may be waived when, in the opinion of the engineer, a meeting is not necessary. Attendees may join the meeting in person, by phone or video conference.

**4.3 Pre-Activity Meeting.** A pre-activity meeting is required in advance of the start of each new activity, except when waived by the engineer. The purpose of this meeting is to review construction details of the new activity. At a minimum, the discussion topics shall include: safety precautions, QC testing, traffic impacts, and any required Hold Points. Attendees shall include the engineer, the contractor superintendent and the foreman who will be leading the new activity. Pre-activity meetings may be held in conjunction with the weekly project meeting.

**4.4 Hold Points.** Hold Points are events that require approval by the engineer prior to continuation of work. Hold Points occur at definable stages of work when, in the opinion of the engineer, a review of the preceding work is necessary before continuation to the next stage.

**4.4.1** A list of typical Hold Point events is available on the MoDOT website. Use of the Hold Point process will only be required for the project-specific list of Hold Points, if any, that the engineer submits to the contractor in advance of the work. The engineer may make changes to the Hold Point list at any time.

**4.4.2** Prior to all Hold Point inspections, the contractor shall verify the work has been completed in accordance with the contract and specifications. If the engineer identifies any corrective

actions needed during a Hold Point inspection, the corrections shall be completed prior to continuing work. The engineer may require a new Hold Point to be scheduled if the corrections require a follow-up inspection. Re-scheduling of Hold Points require a minimum 24-hour advance notification from the contractor unless otherwise allowed by the engineer.

**5.0 Quality Assurance Testing and Inspection.** MoDOT will perform quality assurance testing and inspection of the work, except as specified herein. The contractor shall utilize the inspection checklists provided in the ITP as a guide to minimize findings by MoDOT inspection staff. Submittal of completed checklists is not required, except as specified in 5.1.

**5.1** Inspection and testing required in the production of concrete for the project shall be the responsibility of the contractor. Submittal of the 501 Concrete Plant Checklist is required.

**6.0 Basis of Payment.** No direct payment will be made for compliance with this provision.

I. Contractor Quality Control for Plant Mix Bituminous Surface Leveling NJSP-15-21A (J7S3293B)

**1.0 Description.** The contractor shall provide Quality Control (QC) testing and shall perform verification procedures associated with the production and placement of Plant Mix Bituminous Surface Leveling Mixture in accordance with this provision.

**2.0 Asphalt Plant Requirements.** The contractor shall perform quality control testing in the production of the Surface Leveling Mixture and report the results electronically on MoDOT-provided forms. All reports shall include the Contract ID, Project Number, Route, County, and Job Mix number.

**2.1** Calibration of the asphalt plant shall be in accordance with Sec 403.17.2.2. Record retention for verification of test reports shall be in accordance with Sec 403.17.3.2.

**2.2** At a minimum, the contractor shall perform one QC sieve analysis test for each day of production of Surface Level mixture in excess of 100 tons to verify the aggregate is within the required gradation range. Results of the QC sieve analysis test shall be reported to the engineer daily. A split of each sample shall be clearly labeled and stored by the contractor in a manner that prevents contamination. The engineer will collect a minimum of one random QC split sample, and one full sample from plant production, for testing per each 10,000 tons of production. Uncollected QC split samples shall be retained by the contractor until the engineer authorizes disposal or until the Final Inspection, whichever occurs earlier.

**2.3** The contractor shall monitor the quantity of asphalt binder used in the production of the mix, including any commercial mix, and report that quantity to the engineer. Original asphalt binder delivery tickets shall accompany the report submitted to the engineer. The engineer will perform a minimum of one asphalt binder content test per each 10,000 tons of production for any project that exceeds a total of 5,000 tons of production.

**2.4** The contractor shall take a daily QC sample of the asphalt binder per instructions in Section 460.3.13 of the EPG. The engineer will collect the QC samples and ship to the MoDOT Central lab for random testing. In addition, the engineer will take a minimum of one random Quality Assurance sample per project from the binder line. The engineer sample will be shipped to the Central Lab along with the daily samples and will be designated for testing.

**2.5** The contractor shall perform one moisture content test for each day of production of Surface Level mixture in excess of 100 tons. The frequency of the moisture test may be reduced if approved by the engineer.

**3.0 Roadway Requirements.** The contractor shall perform quality control verification of the Surface Leveling Mixture on the roadway and shall monitor the asphalt tonnage placed in relation to plan quantity.

**3.1 Irregularities.** Additional tons of Surface Leveling mix will be provided for irregularities in the existing roadway surface. The tonnage specified for irregularities is an estimated quantity and shall only be placed at locations where it is necessary to fill ruts and other low points. Prior to placing the mix, the contractor and engineer shall evaluate the entire route and develop a plan that best utilizes the tonnage needed for irregularities. Any excess quantity of irregularities shall not be placed.

**3.2 Tack.** On the first day of production, the contractor shall demonstrate proper application of tack coat in the presence of the engineer. Thereafter, when the engineer is not present to witness the application of the tack coat, the contractor shall document the tack application by taking a minimum of two high-resolution date/time stamped photographs of the tacked surface per one-mile segment. Pictures should be taken just in front of the paver in order to account for loss of tack from truck tires. The contractor shall also monitor and document the application rate. The contractor shall take distributor readings at the beginning and ending of each shift and document the quantity used.

**3.3 Spreading and Rolling.** On the first day of production, the contractor shall demonstrate successful spreading and compaction of the mixture, including proper rolling patterns, in the presence of the engineer. Thereafter, the contractor shall monitor all roadway production procedures and document daily. Use of approved Intelligent Compaction technology is an allowable substitute for daily documentation.

**3.4 Monitoring of Quantity.** The contractor shall monitor the quantity of Surface Level mix placed and report that information to the engineer and production staff as specified herein.

**3.4.1** The contractor shall verify that the quantity of Surface Leveling mix in the contract for each route is sufficient to cover the roadway as shown on the typical sections, including any surface irregularities. Any discrepancies shall be brought to the engineer's attention in writing prior to the pre-construction conference. Plan quantity shall be defined as the total tons computed to cover the surface area according to the typical section, plus any amount pre-approved by the engineer for pavement irregularities.

**3.4.2** The contractor shall provide temporary log mile reference points at no less than ½ mile intervals along each route to monitor the tons of Surface Leveling mix laid in relation to plan quantity. Entrances, shoulders, or other irregular areas will be monitored as directed by the engineer.

**3.4.3** During production, the contractor shall document the total tons placed in each one-mile segment, along with the plan quantity and the percent over/under for that segment. The cumulative quantity and percent over/under for the route should also be documented. After each one-mile segment, the contractor shall provide a status report to the production manager

and the engineer. When the engineer is not present on the project, the contractor shall send an electronic status report to the engineer.

**3.4.4** The goal is to keep the placed quantity within 2% of plan quantity for the project. The engineer will monitor the status reports and will advise the contractor on how to proceed when there is an excessive variance from plan quantity. The engineer may decrease the frequency of the electronic status reports when the variances are consistently low.

**3.4.5** The contractor shall collect asphalt tickets from the delivery trucks and group them per each one-mile segment. The contractor shall submit to the engineer a daily summary report that includes all of the information specified in Section 3.4.3. The contractor shall sign the summary report confirming that the information is accurate and that the attached tickets represent the asphalt material placed.

**3.4.6** The contractor shall be equipped with a contractor-furnished cellular device capable of providing and maintaining a reliable means of immediate communication with the engineer when the engineer is not present on the project.

**4.0 Excessive Quantity.** If the contractor places Surface Level mix on any one-mile segment, or any other isolated areas, in excess of plan quantity by 5% or more, without prior approval from the engineer, further investigation may be required to determine if the excess was warranted. If directed by the engineer, the contractor shall core the pavement at locations established by the engineer to determine the amount that was excessive, if any. No payment will be made for the cost to core the pavement or for the tons of Surface Level mix that the engineer determines to be excessive. If the amount of Surface Level mix is determined to be justified, payment will be made for the mix, and for the cost of coring at the fixed price established in Sec 109. Placement of asphalt in excess of plan quantity for two consecutive segments without prior approval from the engineer may result in issuance of an Order Record to stop work.

**5.0 Basis of Payment.** No direct payment will be made for compliance with this provision. All costs shall be considered completely covered under the pay items provided in the contract.

J. Linear Grading Class 2 for Shoulders (J7S3293B)

**1.0 Description.** Linear Grading Class 2 for Shoulders shall consist of preparing the shoulder subgrade by excavating, compacting, fine-grading, and shaping existing shoulder and ditch foreslope, conforming to the typical section shown on the plans. It may also be necessary to excavate and haul material approximately 200 feet to bring the roadway to the desired grade and may involve work on high banks, side hills, and rock outcroppings. It shall be the contractor's sole responsibility to determine the effort and material required to accomplish the work. Linear Grading Class 2 shall also be in accordance with the applicable portions of Section 207 and specifically as follows.

**2.0 Construction Requirements.**

**2.1** This work shall include all grading work necessary to construct a new Modified A3 shoulder and finish the foreslopes along the existing edge of pavement with suitable material as shown in the plans. Construction requirements shall also be in accordance with Section 207.2. The contractor shall perform substantial mechanical compactive effort for the subgrade compaction

as approved by the engineer. Subgrade preparation and compaction shall also be in accordance with Sections 209 and 210.

**2.2** All ditches shall maintain existing ditch line unless otherwise approved by the engineer. All ditches shall utilize existing drainage structures. Slopes can be steepened, if necessary, to utilize existing drainage structures as approved by the engineer.

**2.3** The contractor shall furnish, install, maintain, and remove any temporary pollution, erosion and sediment control measures required based on construction operations in accordance with Section 806 or as directed by the engineer.

**2.4** Bringing the subgrade for shoulders to proper grade and section shall be accomplished by grading and compacting the existing shoulder material in order to construct a Modified A3 shoulder to the width as shown in the typical sections. In areas where the shoulder width on the typical sections cannot be built, the contractor shall construct as much shoulder width as field conditions will allow with a 1-foot minimum shoulder width. If it is not possible to construct a shoulder of at least a minimum 1-foot width in an area, the contractor shall notify the engineer. The engineer shall make a decision whether to direct the contractor to build a less than one foot shoulder or eliminate the shoulder entirely in this area.

**2.5** Excess excavation should be wasted within the limits of the right of way as approved by the engineer.

**3.0 Method of Measurement.** Final measurement will not be made except where appreciable errors are found in the contract quantity.

**3.1** Where required, measurement will be made to the nearest 10 feet, separately for the length of shoulder along each side of the roadway, measured along centerline of the traveled way and totaled to the nearest 100 feet for the sum of all segments.

**3.2** If material is encountered that may be classified as other than Class A Excavation as described in Sec 203.2.1, the limits of linear grading will not be underrun. Material classified as other than Class A Excavation will be measured and paid for per cubic yard in accordance with Sec 203.8. Where undergrading is necessary, backfilling of the undergraded area will be considered as part of the Modified Linear Grading, Class 2 operation.

**4.0 Basis of Payment.** Payment for Linear Grading Class 2 for Shoulders as described in this provision will be made at the contract unit price for pay item 212-99.00, MISC. Linear Grading Class 2 for Shoulders and will be considered as full compensation for labor, equipment, material, or other construction involved to complete the described work. No direct payment will be made for preparing or compacting the subgrade as required.

K. Optional Shoulder JSP-13-03 (J7S3293B)

**1.0** The bid item for the shoulder material is for the bituminous asphalt option, however, a Concrete Shoulder option is allowed as shown on the typical section and as specified herein.

**1.1** Should the contractor choose to construct the Concrete Shoulder option, notification should be given to the engineer in advance of the work so that a change order can be issued to facilitate payment of the Concrete Shoulder with a contingent item as specified herein.

**1.2** For the Concrete Shoulder option, a zero-cost change order will be issued to deduct the theoretical tonnage of asphalt mixture necessary to construct the shoulder, and a contingent item for the total volume of Concrete Shoulder will be added to the change order. The engineer will determine the theoretical tonnage of asphalt and the total cubic yards of Concrete Shoulder. No additional payment will be made for a Concrete Shoulder rumble strip.

**1.3** The theoretical tonnage of asphalt will be determined by converting the theoretical volume to weight using a factor of 1.98 tons/cubic yard. The theoretical volume is the total amount of asphalt material needed to construct the shoulder and Safety Edge<sup>sm</sup>, according to the typical section.

**1.4** The tonnage will be deducted from the contract and replaced with the computed volume of Concrete Shoulder (cubic yards). The contingent item for Concrete Shoulder would include both providing and placing the Concrete Shoulder. The total price for the concrete shoulder will be equivalent to the computed total price of the theoretical tonnage of asphalt mixture necessary to construct the shoulder. A unit price will be determined by dividing the total concrete price by the total computed concrete volume.

**2.0 Construction Requirements.** Concrete Shoulder shall meet the applicable requirements of Sec 502. Roller Compacted concrete is an allowable option for the Concrete Shoulder.

**3.0 Method of Measurement.** For the Concrete Shoulder option, measurement shall be made per cubic yard.

**4.0 Basis of Payment.** For the Concrete Shoulder option, the accepted quantity of Concrete Shoulder will be paid for at the established unit price. The Concrete Shoulder rumble strip will be paid for at the unit price bid for the bituminous shoulder rumble strip.

L. Modified Bituminous Pavement Mixture (BP-2) NJSP-15-39 (J7S3293B)

**1.0 Description.** In addition to the requirements of Sec 401.3, the total aggregate prior to mixing with asphalt binder shall be in accordance with the following gradation requirements:

| Sieve Size | Percent Passing by Weight |
|------------|---------------------------|
|            | <b>BP-2</b>               |
| 1 inch     | 100                       |
| 3/4 inch   | 100                       |
| 1/2 inch   | 99 - 100                  |
| 3/8 inch   | 90-100                    |
| No. 4      | 60-90                     |
| No. 8      | 40-70                     |
| No. 16     | ---                       |
| No. 30     | 15-35                     |
| No. 200    | 5-12                      |

**2.0 Basis of Payment.** The accepted quantity Modified Bituminous Pavement Mixture (BP-2) shall be paid for at the contract unit price, as designated in the plans, for one of the following:

401-99.10, Misc. Modified Bituminous Pavement Mixture (BP-2) PG 64-22, per ton or  
401-99.10, Misc. Modified Bituminous Pavement Mixture (BP-2) PG 70-22, per ton

M. Coarse Aggregate Adjustment for BP Mixture (BP-2) LP Mixes (J7S3293B)

**1.0 Description.** In addition to the requirements of Sec 401, the following shall apply to the Bituminous Pavement Mixture (BP-2) LP mix as specified for use in designated locations on this project.

**2.0 Blended Aggregate.** At least 50 percent by volume of the plus No. 8 material shall be from crushed porphyry as specified in Sec 1002. Depending on the actual gradation of porphyry aggregate furnished, the amount of crushed porphyry required will vary, however at least 40 percent by weight of crushed porphyry will be required. **NO SUBSTITUTIONS WILL BE ALLOWED.**

**3.0 Basis of Payment.** The accepted quantity of Bituminous Pavement Mixture (BP-2) LP shall be paid for at the contract unit price for, 401-99.10 Bituminous Pavement Mixture (BP-2) PG 64-22 (limestone/porphyry) per ton, including all labor, equipment, and material costs required to fulfill the requirements of the special provision.

N. Cooperation Between Contractors – SW

**1.0 Description.** This contract is one of several contemplated relative to the overall project. Separate contracts may be let that will be within this contracts area.

**2.0 Construction Requirements.**

**2.1** The work for this project shall be performed in the order necessary to best facilitate the early completion of the combined projects on this improvement. The contractor shall be required to arrange the storage of materials and equipment and perform the construction operations so as not to unduly interfere with the operations of other contractors. This may require the contractor to store equipment and materials off state right of way and make the necessary arrangements for storage sites.

**2.2** Full cooperation of the contractors involved with this improvement in careful and complete coordination of their respective activities in the area will be required. Each contractor involved shall so schedule and conduct work as to avoid unnecessary inconvenience, delay to another and a manner as not to damage work being performed or completed by another. When necessary for proper prosecution of work, each contractor shall permit the other access through the overlapping construction areas and the use of any access or haul roads constructed by others.

**2.3** Job J7S3367B is an ADA improvement project from Banning Street to east of Blair Street in Marshfield. Letting is scheduled for February 2022.

**2.4** Job J7S3439 is an ADA improvement project from Route CC to Walnut Street, on Route DD from Route 38 to Elm Street, and on Route A from Route 38 to north of Elizabeth Street in Marshfield. Letting is scheduled for February 2022.

**3.0 Method of Measurement.** No measurement will be made.

**4.0 Basis of Payment.** Payment for the above described work will be considered completely covered by the contract unit price for other items included in the contract.

O. Flagging Procedure for Two-Lane Roadways (3-2-1 Cone Procedure) NJSP-17-03A

**1.0 Description.** Flagging operations shall be in accordance with the Manual on Uniform Traffic Control Devices (MUTCD) Chapter 6, Section 107 and 616 in Missouri Standard Specifications for Highway Construction, Missouri Standard Plans for Highway Construction, temporary traffic control plans, and as described herein.

**2.0 Procedures for Flagging Short, Intermediate, or Long-Term Stationary Operations.** This procedure includes the use of three traffic cones or other channelizing devices.

**2.1 Step 1.** The flagger shall place three cones across the lane of traffic to be stopped, from centerline to shoulder. When no vehicles are present, the flagger should remain on the shoulder with the stop paddle visible.

**2.2 Step 2.** When traffic has stopped, the flagger shall move towards the centerline of the roadway, keeping the stop paddle visible, and keeping a visual contact with the stopped drivers. Once the flagger has confirmed that opposing traffic is clear, the flagger shall prepare to release the stopped traffic.

**2.3 Step 3a.** If the vehicles are to travel in the current lane, the flagger shall remove the center cone from the center of the lane.

**2.4 Step 3b.** If the vehicles are to travel in the opposite lane, the three cones shall remain across the closed lane.

**2.5 Step 4.** If opening the lane (Step 3a above) the flagger shall walk back to the shoulder with the cone, turn the stop paddle to slow, and then release traffic using a hand signal to direct vehicles between the two remaining cones. If releasing traffic to the other lane (Step 3b above) the flagger shall remain near the centerline of the roadway, turn the stop paddle to slow, and use a hand signal to direct the traffic around the cones into the open lane.

**2.6** Once all traffic has cleared, the flagger shall return the slow paddle to stop. The flagger shall replace the cone to the center of the lane or leave the cones across the lane. The flagger then returns to the shoulder and repeats the steps.

**2.7** If the roadway width is less than 12 feet, the number of cones may be reduced to two or one, or other channelizing devices may be used.

**3.0 Basis of Payment.** No direct payment will be made for any cost associated with this provision.

**Pictorial Representation of Steps for Flagging Procedure for Two-Lane Roadways (3-2-1 Cone Procedure)**



STEP 1



STEP 2



STEP 3



STEP 4

P. Pilot Car in Use – Wait and Follow Sign NJSP-18-03

**1.0 Description.** The sign shown below shall be printed on 4 mm corrugated plastic or similar and supported with a 10"x30", 9 gauge, galvanized steel H-frame, or similar. This sign shall only be used at private and commercial entrances to enhance the work zone signing, and will not be permitted for use on intersecting state, county, or city roads.

**2.0 Method of Payment.** Signs shall be contractor furnished/contractor retained. The cost of the signs and stands are incidental to other traffic control items.



Q. Bridge End Transitions – SW (J7S3346)

**1.0** At all bridge exceptions, the engineer will determine in the field the ending point of the transition. This point will not necessarily be at the bridge end, but will be located at a point which provides a smooth transition and approach to the bridge. The limits of all bridge end transitions shall be approved by the engineer before any milling proceeds on these transitions. Where bridges are to be resurfaced, the surfacing shall be from curb to curb.

R. Pavement Marking Log – SW

**1.0 Description.** This work shall consist of the Contractor documenting the location of all existing pavement markings prior to coldmilling or resurfacing and installing new pavement markings to match the scheme that was in place prior to the project.

**2.0 Construction Requirements.** Prior to the start of resurfacing work, the Contractor shall document the color, type, and location of the existing pavement markings, including any change in pavement marking (e.g., solid yellow to intermittent yellow on the centerline) and no passing zones. The Contractor shall submit the method of documentation to the Engineer for approval prior to recording the existing pavement marking information.

**2.1** The existing pavement marking documentation provided by the Contractor shall include the location of existing pavement markings by either station or log mile. The Engineer shall reserve the right to make adjustments to the final pavement marking locations. The Engineer will provide the Contractor with any adjusted locations. Under no circumstances shall the Contractor make adjustments to the location of permanent pavement markings without the Engineer's approval.

**2.2** All permanent pavement markings shall be installed in accordance with Sec 620.

**3.0. Temporary Pavement Marking.** The Contractor shall provide temporary pavement marking in accordance with Sec 620 and Standard Plan 620.10. No compensation will be made to the Contractor for temporary pavement marking.

**4.0 Method of Measurement.** Measurement will be made in accordance with Sec 620.

**5.0 Basis of Payment.** No direct compensation will be made to the Contractor for compliance with this provision. All costs associated with the equipment, labor, materials, and time necessary to fulfill the requirements of this provision shall be considered completely covered by the pavement marking (Sec 620) line items in the contract.

S. Temporary Short-Term Rumble Strips JSP-13-05E

**1.0 Description.** The work shall include furnishing, installing, maintaining, removing, and relocating the short-term rumble strips, as shown in the plans, or as designated by the engineer.

**2.0 Material.**

**2.1** The short-term rumble strips shall be 10 to 12 feet in length, minimum of 8 inches wide,  $\frac{3}{4}$  to  $1\frac{1}{4}$  inch thick, fabricated from a polymer material, and orange in color.

**2.2** The short term-rumble strips shall not curl or deform across the width of the strip, maintaining its rigidity.

**3.0 Construction.**

**3.1** Each set shall consist of three individual strips spanning a single lane, spaced in accordance with the plans or as directed by the engineer. The short-term rumble strips shall be installed and removed in accordance with manufacturer's recommendation.

**3.2** The contractor shall monitor, maintain alignment, and repair if needed the short-term rumble strips during construction. Short-term rumble strips shall not be placed on roadways when there are no workers present.

**3.3** Strips shall not extend onto the shoulder without the approval of the Engineer.

**4.0 Method of Measurement.** Measurement of short-term rumble strips will be based per each set.

**5.0 Basis of Payment.** The accepted quantity of Temporary Short-Term Rumble Strips sets will be paid for at the contract unit price for 616-20.04, Temporary Short-Term Rumble Strips, per each set. The short-term rumble strips unit bid price shall include the cost of all labor, equipment, and materials to install, maintain, remove and relocate the rumble strips during the construction of the project.

T. Permanent Pavement Marking - SW

**1.0 Description.** This work shall consist of furnishing and placing permanent centerline, edge line, lane line markings, and preformed thermoplastic pavement marking, as specified, at locations shown on the plans or as approved by the engineer. The preformed thermoplastic pavement marking includes, but not limited to, 24" White (Stop Bars) and 24" Yellow (Hash Mark), 6" White for Crosswalks, Turn Arrows, Railroad Crossings, Yield Markings, and the word "ONLY". This work shall be in accordance with Section 620 and specifically as follows.

**2.0 Construction Requirements.** On roadways open to traffic, permanent centerline, edge line, and lane line markings shall be in place no later than five days after the final paving operations. This requirement applies per individual route if multiple routes are included in a contract or if a 15 mile section of an individual route is open to traffic within a contract. To fulfill this requirement, the contractor may have to mobilize more than once for the installation of permanent centerline, edge line, and lane line markings. The contractor will also need to coordinate the permanent pavement marking with the installation of rumble strips. The contractor shall place the preformed thermoplastic pavement marking after the permanent centerline, edge line, and lane line marking is installed by the contractor or by others. The contractor will have 5 five days after the permanent centerline, edge line, and lane line markings are placed to start the preformed thermoplastic pavement marking installation and shall be placed in accordance with manufacturer's recommendations or as approved by the engineer.

**3.0 Basis of Payment.** The accepted quantity of permanent pavement marking paint and preformed thermoplastic pavement marking will be paid for at the contract unit price for each of the pay items include in the contract. Payment will be considered full compensation for all labor, equipment, material, or time necessary to complete the described work including any other incidental items.

U. Permanent Aggregate Edge Treatment - SW

**1.0 Description.** This work shall consist of furnishing and placing an aggregate material on the shoulders of the resurfaced route in areas indicated in the plans or as directed by the engineer. This work and material shall be in accordance with Section 310 except as follows. The edge treatment shall be at least 2' wide.

**2.0 Material**

2.1 Aggregate Material utilized for permanent aggregate edge treatment shall be either commercial base or coldmillings. Any material shall be approved by the engineer prior to use.

2.1.1 Coldmilling material shall be an asphaltic material created by the equipment and operations as defined in Standard Specification 622.10.

2.1.2 Aggregate material shall be a 1" commercial base.

**3.0 Construction Requirements.** The contractor shall furnish, haul and spread aggregate material or coldmillings to bring the shoulders up to match the overlaid pavement elevation as shown in the typical sections.

**3.1** Aggregate or coldmillings shall be simultaneously deposited and spread on the sub-grade and shall not be deposited on the pavement or shoulder and bladed into place without prior approval from the engineer. Aggregate material or coldmillings shall be shaped according to the typical section and compacted until there is no visible evidence of further consolidation.

**3.2** Density shall be obtained from reasonable compactive efforts consisting of no less than three passes with a roller until no further visible compaction can be achieved, or by other methods approved by the engineer.

**3.3** After all placing, shaping, and compactive effort operations are completed, the permanent aggregate edge treatment shall match the overlaid pavement elevation as shown in the typical sections.

**3.4** A prime coat (MC-800) in accordance with Section 408, shall be placed on top of all permanent aggregate edge treatment, regardless of material used, at a target rate of 0.25Gal/SY.

**4.0 Method of Measurement.** Measurement of material furnished for shoulder aggregate shall be dependent upon the material the contractor chooses to use for this work. If the contractor chooses to use a 1" commercial base, measurement will be made per ton and in accordance with Section 310.5.3. If the contractor chooses to use coldmillings, measurement will be made per linear foot. In regards to utilizing coldmillings, the Contractor is hereby being informed that it shall be their responsibility to review the existing slopes on the project and ensure there is sufficient material to install new slopes in accordance with the specifications and plans. Measurement for all prime (MC-800) will be in accordance with Section 408.5

## **5.0 Basis of Payment.**

**5.1** The bid item for the shoulder material is for the 1" commercial base option. The accepted quantities of permanent aggregate edge treatment will be paid for at the contract unit price for PERMANENT AGGREGATE EDGE TREATMENT, pay item 304-99.10, including all labor, equipment, and material costs required to fulfill the requirements of the special provision

**5.1.1** Should the contractor choose to construct the permanent aggregate edge treatment with coldmillings, notification must be given to the engineer in advance of the work so that a change order can be issued to facilitate payment of the permanent aggregate edge treatment with a contingent item as specified herein.

**5.1.2** For the coldmilling option, a zero-cost change order will be issued to zero out the tonnage of permanent aggregate edge treatment so that it can be converted to a linear foot quantity pay item. A contingent item for the permanent aggregate edge treatment paid by the linear foot will be added to the change order. The linear footage added to the contract shall be double the

centerline miles of the project. A unit price for the permanent aggregate edge treatment, coldmilling option, will be determined by multiplying the original permanent aggregate edge treatment unit bid price and the tonnage included in the contract, then dividing by double the centerline miles of the project.

**5.2** The prime coat (MC-800) shall be paid for at the contract unit price for PRIME (MC-800), pay item 408-10.18, regardless of the material used to construct the edge treatment.

V. Culvert Location - SW

**1.0 Description.** This work shall consist of the Contractor documenting the location of all existing crossroad culverts prior to conducting grading operations or placement of permanent aggregate edge treatment.

**2.0 Construction Requirements.** Prior to the start of grading or edge treatment work, the Contractor shall document the location of the existing crossroad culverts. The Contractor shall submit the method of documentation to the Engineer for approval prior to recording the existing culvert location.

**2.1** The documentation provided by the Contractor shall include the location of existing crossroad culverts by either station or log mile. Under no circumstances shall the Contractor begin grading or edge treatment work without the Engineer's approval.

**2.2** The location of each crossroad culvert shall be indicated with a lathe or other identifier that can be seen during contractor operations.

**2.3** The contractor shall exercise reasonable care in the locations of the crossroad culverts and all driveway culverts to ensure that grading or edge treatment operations do not result in the blockage of the culvert.

**2.4** The contractor as directed by the engineer shall remove any material from all culverts that was placed by grading or edge treatment operations.

**3.0 Basis of Payment.** No direct compensation will be made to the Contractor for compliance with this provision. All costs associated with the equipment, labor, materials, and time necessary to fulfill the requirements of this provision shall be considered completely covered by line items in the contract.

W. Gravel A or Crushed Stone B - SW

**1.0 Description.** This work shall consist of furnishing and placing gravel or crushed stone surfacing for transitions at aggregate side roads and entrances upon completion of overlay and shoulder work. This work and material shall be in accordance with Section 310 except as follows.

**2.0 Construction Requirements.** The contractor shall furnish, haul, and spread gravel or crushed stone surfacing to smooth up the transitions and eliminate any edge drop offs created at aggregate side roads and entrances created from the construction of shoulders as approved by the engineer.

**3.0 Method of Measurement.** Measurement of material furnished for gravel or crushed stone will be made in accordance with Section 310.5.3, excluding any deductions for moisture.

**4.0 Basis of Payment.** The accepted quantities of gravel or crushed stone will be paid for at the contract unit price, including all labor, equipment, and material costs required to fulfill the requirements of the special provision.

X. Contractor Furnished Surveying and Staking - SW

In addition to the requirements of Section 627 of the Missouri Standard Specifications for Highway Construction, the following shall apply:

**1.0 Description.** The contractor shall be responsible for all layout required on the project. This responsibility shall include, but not be limited to the following: Construction signing, transition milling, pavement marking, loop detectors, etc.

**1.1** The above list is not all inclusive. The contractor shall have the primary responsibility for these operations. The contractor shall provide the Resident Engineer (RE) with a staking plan layout for approval prior to the installation of signs. The RE will also provide assistance during this layout provided a request is submitted to the RE or Construction Project Manager 48 hours in advance. This will ensure that all permanently mounted traffic control devices remain consistent with District policy and avoid re-staking. If the contractor installs any signs without engineer approval, all costs associated with re-staking and/or relocation will be at the contractor's expense.

**1.2** The intent of this provision is to increase the quality of our work zones and minimize negative impacts to the contractor's schedule that can result from delays in staking.

**1.3** Any adjustments to the plan quantities or line numbers established in the contract shall be approved by the Engineer.

**2.0 Basis of Payment.** No direct payment will be made to cover the costs associated with these additional requirements. All costs will be considered completely covered by the unit bid price submitted for Contractor Furnished Surveying and Staking.

Y. Damage to Existing Pavement, Shoulders, Side Roads, and Entrances - SW

**1.0 Description.** This work shall consist of repairing any damage to existing pavement, shoulders, side roads and entrances caused by contractor operations. This shall include, but is not limited to, damage caused by the traffic during contractor operations within the project limits including the work zone signing.

**2.0 Construction Requirements.** Any cracking gouging, or other damage to the existing pavement, shoulders, side roads, or entrances from general construction shall be repaired within twenty-four (24) hours of the time of damage at the contractor's expense. Repair of the damaged pavement, shoulders, side roads, or entrances shall be as determined by the engineer.

**3.0 Method of Measurement.** No measurement of damaged pavement or shoulder areas or damaged side roads or entrances as described above shall be made.

**4.0 Basis of Payment.** No payment will be made for repairs to existing pavement, shoulders, side roads or entrances damaged by contractor expenses.

Z. Access to Commercial Properties - SW

**1.0 Description.** While working on and around commercial entrances, the contractor shall make every reasonable effort to minimize any interference to business and to pursue the work diligently. Under no circumstances shall the contractor block ingress/egress to and from businesses during the normal business hours of each business unless approved by the property owner and the engineer.

**1.1** The contractor shall contact each business to advise them of the work that will take place before working around each business entrance. In some cases where a property has more than one entrance, the property owner may have a preference on whether to have one entrance closed while working around it or whether to have the entrances worked around one-half at a time. The contractor is required to do the work according to each individual property owner's preference. The contractor is not to disturb any existing trees, landscaping, small block walls or irrigation lines. The contractor will solely be responsible for repairing any damage to the property caused by contractor operations.

**2.0 Basis of Payment.** No direct payment will be made to the contractor for all costs incurred with compliance of this provision.

AA. Rumble Strip (J7S3293B)

**1.0 Description.** This work shall consist of constructing rumble strips as shown on the plans or as approved by the engineer.

**2.0 Construction Requirements.** Rumble strips shall be placed in accordance with Section 626. In addition, on roadways open to traffic, rumble strips shall be in place no later than five days after the final paving operations. This requirement applies per individual route if multiple routes are included in a contract or if a 15 mile section of an individual route is open to traffic within a contract. To fulfill this requirement, the contractor may have to mobilize in more than once for the installation of rumble strips.

**2.1** On divided highways, the edge line rumble strip shall be installed as shown in the plans or per the Standard Plans.

**2.2** On two-way roads, the edge line rumble strip shall be installed to maintain 21' preferred/20' absolute minimum between each edge line rumble. If the contract includes a centerline rumble in addition to the edge line rumble, the contractor shall only install the centerline rumble if 10.5' lane can be maintained between the edge of the centerline rumble and edge line rumble or as approved by the engineer. If this minimum distance cannot be achieved, the centerline rumbles may be underrun as approved by the engineer.

**2.3** On two-way roads with existing 2' shoulders or include construction of new 2' shoulders, the edgeline rumble strip shall stop and start 25' to each side of the intersecting road or entrance unless otherwise approved by the engineer.

**3.0 Basis of Payment.** The accepted quantity of rumble strips will be paid at the contract unit price. Payment will be considered full compensation for all labor, equipment, and material necessary to complete the described work, including mobilizing, loading, hauling, stockpiling and disposal of milled material, and any other incidental items.

**BB. Fertilizing, Seeding, And Mulching (J7S3293B)**

**1.0 Construction Requirements.** In accordance with Sections 801 and 805, the following shall be applied at the rate specified in the locations specified. Dry seeding application methods will be required for slopes flatter than 3:1. Bulk Seed may be used provided live seed rates are met. Vegetative mulch will be stabilized with recycled paper overspray in accordance with Section 802.

| <b>Cool Season Seed Mixture</b>            |                            |
|--------------------------------------------|----------------------------|
| <i>Within the first 30 feet (mow area)</i> |                            |
| Seeding Mixture                            | Pounds Pure Live Seed/Acre |
| Tall Fescue                                | 80                         |
| Teff Grass                                 | 3                          |
| Annual Ryegrass                            | 5                          |
| Perennial Ryegrass                         | 6                          |
| White Clover                               | 6                          |
| Oats                                       | 5                          |
| <b>Total Seed</b>                          | <b>105 PLS lbs./acre</b>   |

| <b>Warm Season Seed Mixture</b>                                            |                            |
|----------------------------------------------------------------------------|----------------------------|
| <i>Outside the first 30 feet and steeper than 3:1 slopes, interchanges</i> |                            |
| Seeding Mixture                                                            | Pounds Pure Live Seed/Acre |
| Indiangrass                                                                | 6                          |
| Big Bluestem                                                               | 4                          |
| Little Bluestem                                                            | 5                          |
| Sideoats grama                                                             | 4                          |
| Switchgrass                                                                | 2                          |
| Canada or Virginia rye                                                     | 2                          |
| Tall dropseed                                                              | 0.5                        |
| Purple Prairie Clover                                                      | 0.5                        |
| Teff Grass                                                                 | 3                          |
| Perennial Ryegrass                                                         | 5                          |
| Tall Fescue                                                                | 5                          |
| Red Fescue                                                                 | 5                          |
| Redtop                                                                     | 1.5                        |
| Partridge Pea                                                              | 3                          |
| White Clover                                                               | 5                          |

|                                                |                         |
|------------------------------------------------|-------------------------|
| Gray Headed Coneflower OR Lance-leaf Coreopsis | 0.25                    |
| Black-eyed Susan                               | 0.25                    |
| Oats                                           | 5                       |
| <b>Total Seed</b>                              | <b>57 PLS lbs./acre</b> |

| <b>Fertilizer</b>                                                         |     |
|---------------------------------------------------------------------------|-----|
| <i>Pounds per acre shown below are applicable to Cold Season Mixtures</i> |     |
| Nitrogen (N)                                                              | 80  |
| Phosphoric Acid (P <sub>2</sub> O <sub>5</sub> )                          | 160 |
| Soluble Potash (K <sub>2</sub> O)                                         | 80  |
| Effective Neutralizing Material                                           | 0   |
| <i>Pounds per acre shown below are applicable to Warm Season Mixtures</i> |     |
| Nitrogen (N)                                                              | 40  |
| Phosphoric Acid (P <sub>2</sub> O <sub>5</sub> )                          | 80  |
| Soluble Potash (K <sub>2</sub> O)                                         | 40  |
| Effective Neutralizing Material                                           | 0   |

**2.0 Basis of Payment.** All expenses incurred by the contractor of furnishing and applying seed fertilizer and mulch shall be considered as included in and completely covered by the contract unit price for 805-10.00A Seeding - Cool Season Mixtures or 805-20.00A Seeding – Warm Season Mixtures per 0.1 acre. Fertilizing and Mulching will be considered incidental to seeding and therefore the contractor will not receive any direct pay for these two items.

CC. Loop Detectors – SW (J7S3346)

**1.0 Description.** This work shall consist of providing loop detectors for signal installations. Detectors shall be in accordance with the standard specifications and installed to provide detection at locations as shown on the plans or as directed by the engineer.

**2.0 Method of Measurement.** Method of measurement will be in accordance with Section 902.

**3.0 Basis of Payment.** Loop Detectors will be paid for at the contract unit price for Pay Item No. 902-85.00, Cable, Loop Detector, In Duct, per Linear Foot. No direct payment will be made for incidental items necessary to complete the work.